

## Best Practices In Supply Chain & Procurement Compliance And Risk Management

### Intelleges Response to Executive Order 13806

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#### The Next New Thingin Supply Chain Risk Management & Procurement Compliance

Δ Full Spectrum Compliance, Risk and Vulnerabilities Assessment

#### Company Overview

Intelleges provides a cloud-based supply chain risk assessment and procurement compliance platform mainly for the manufacturing and defense industrial base of the United States.

Working with companies around the globe, both large and small, Intelleges's singular focus is to ensure that enterprises and all tiers of the entity's supply chain are aligned in their efforts to reduce risk and decrease the overall effort required to meet compliance and risk objectives.

Enterprises need to overcome traditional supply chain risk management challenges such as:

- Limited visibility into partner/supplier risk
- Limited ability to share information from one supplier to multiple buyers or between suppliers
- Limited industry-standard measurements to assess and address risk
- Limited standard platforms providing dashboards and visualizations for a rapid overview of partner/supplier risk
- Enterprise-wide redundant processes to collect partner/supplier risk data
- Limited roadmaps to improve supplier vulnerabilities
- Limited tools to measure improvement in real-time and over time
- Paper-based approach for data and document collection is



not secure, inefficient and does not allow information to be shared and validated across documents.

#### OUR PLATFORM IS SIMPLE AND EASY TO USE

1. Collect data



2. Clean data



3. Identify patterns



4. Make predictions



#### Companies must confront these challenges with

- Engagement at the operational, tactical, and strategic level
- Cross-smokestack capabilities
- Enterprise-level transformation and adoption of new technologies

The approach needs to be comprehensive but also flexible enough to meet the specific requirements of each procurement. Different levels of information are required from various suppliers: a FAR Part 12 compliant supplier is not vetted as much as a FAR Part 15 supplier. Systems have to be flexible enough to handle these types of requirements.

#### Intelleges Response to Executive Order 13806

Although, we encourage everyone to read EO 13806, we provide excerpts here in Appendix A for your convenience.

For the most part we agree with 13806 and believe that it is at a high-level the most comprehensive look at the significant challenges the United States faces in terms of Strengthening the Manufacturing and Defense Industrial Base and Supply Chain



Resiliency of the country. However, we also believe that

- 1. it does not go far enough in terms of root causes, and
- 2. it does not offer any concrete solutions to the myriad of problems it presents.

For Intelleges, the number 1 problem of Supply Chain Resiliency is Supply Chain Illumination.

Government agencies do not have the ability to get eyes on key problems quickly and address issues before they become systemic. By supply chain illumination, we mean the ability to quickly and securely collect data and documents across the supply chain and deep into the sub-tiers and then quickly aggregate that information so that senior leadership can gain supply chain risk visibility and make decisions to reduce risk and exploit identified opportunities.

The approach has to be comprehensive because the risks are multifaceted.

First, let's review some root causes.

A cursory review of the key issues outlined in EO 13806, i.e.,

- 1. Single/Sole source procurements
- 2. Fragile suppliers
- 3. Fragile markets
- 4. Capacity constraints
- 5. Foreign dependency
- 6. Human capital deficiencies
- 7. Product provenance and pedigree

reveals that on most of these matters, procurement officers, compliance personnel, and audit staff do not have enough, if any, reliable sources of data to adequately assess risks.



PDF, MS Word, MS Excel, Adobe Acrobat or paper forms and thus not easily accessible, or because sub-tier suppliers do not want to share detailed information about their own supply base with their customers.

Moreover, even if the data is shared, it is shared in formats that are not easily accessible and cannot be aggregated for predictive analytics and risk assessments.

Essentially, without acceptable data resources, those that are tasked with assessing Supply Chain Resiliency are essentially not able to do it all.

Secondarily, although EO 13806 is comprehensive in its scope, it fails to dig deep enough in order to uncover the actual risks. For many supply chain challenges such as

- Fragile markets
- · Foreign dependency, and
- Product security

Data must be collected at the purchase order and part number level. It is not sufficient to ask a supplier if they have a foreign dependency. Each part must be analyzed in order to determine country of origin and product content.



Intelleges's Supply Chain Risk Assessment Questionnaire is structured around 42 controls that focus on supplier risk, product security and purchase order constraints such as on-time-delivery (OTD) and product quality.

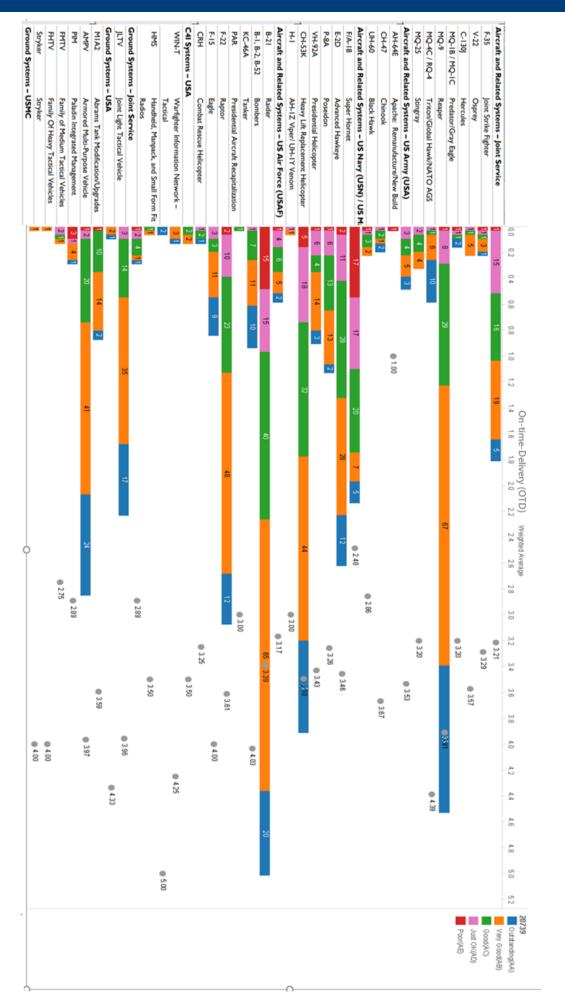
#### FULL SPECTRUM COMPLIANCE, RISK AND VULNERABILITIES ASSESSMENT



For over 20+ years, we have focused on assisting firms, mostly in the aerospace and defense industry, with a customizable, cloud-based platform that allows our customers to connect-the-dots and add visibility to the overall supply chain.

To find out how Intelleges can help you illuminate your supply chain please contact your account representative or email global.accounts@intelleges.com.





With pulse-monitoring cadences, Intelleges gives your senior leadership real-time data, with alerts and action-oriented approval workflows.

Intelleges.com



#### Find Out More



Collecting data and documents from procurement personnel and suppliers using email, PDF, Excel and Word documents is not secure, inefficient and adds considerable risk to your overall supply chain

CONTACT US

AND ASK FOR A FREE

SUPPLY CHAIN RISK ASSESSMENT

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Appendix A: Executive Order 13806 (Excerpted)

# Assessing and Strengthening the Manufacturing and Defense Industrial Base and Supply Chain Resiliency of the United States

#### Whole of Government Approach

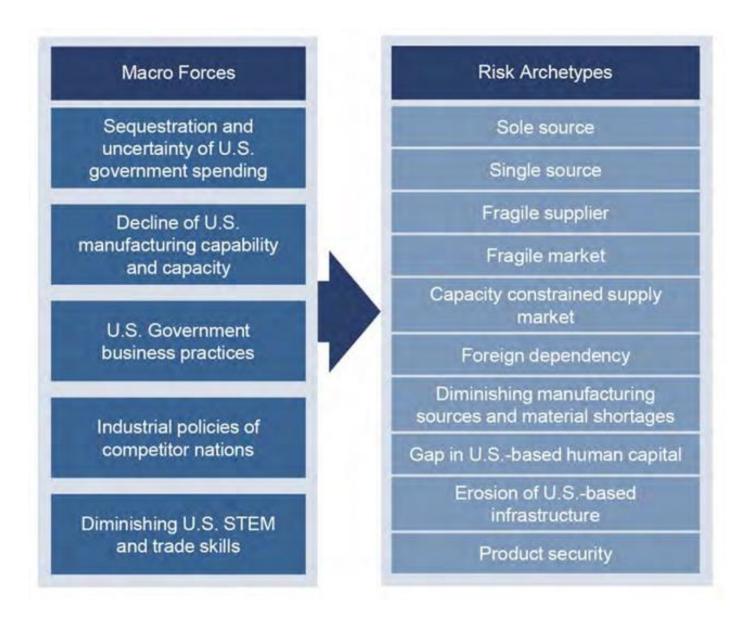
Executive Order 13806 directs the Secretary of Defense to conduct a whole-of-government effort to assess risk, identify impacts, and propose recommendations in support of a healthy manufacturing and defense industrial base – a critical aspect of economic and national security. The EO 13806 effort was initiated by the White House Office of Trade & Manufacturing Policy led by the Department of Defense's Office of Industrial Policy in coordination with the Departments of Commerce, Labor, Energy, and Homeland Security, and in consultation with the Department of the Interior, the Department of Health and Human Services, the Director of the Office of Management and Budget, the Director of National Intelligence, the Assistant to the President for National Security Affairs, the Assistant to the President for Economic Policy, and the Assistant to the President for Trade & Manufacturing Policy.

Currently, the industrial base faces an unprecedented set of challenges: sequestration and uncertainty of government spending; the decline of critical markets and suppliers; unintended consequences of U.S. Government acquisition behavior; aggressive industrial policies of competitor nations; and the loss of vital skills in the domestic workforce.



#### Significant findings:

- 1. Macro forces have led to impacts primarily in the sub-tiers of the defense supply chain;
- 2. A surprising level of foreign dependence on competitor nations exists;
- 3. Workforce challenges face employers across all sectors; and
- 4. Many sectors continue to move critical capabilities offshore in pursuit of competitive pricing and access to foreign markets.



#### Risk-Based Methodology

Companies have to implement a risk-based methodology for oversight of contractors to address these risks, founded on risk management



framework principles to assess and counter threats to critical technologies and priority assets.

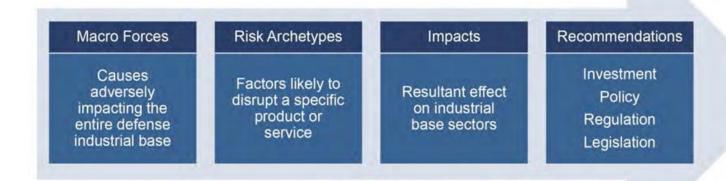
#### Critical steps include:

- Addressing their dependency on sources of supply in politically unstable countries;
- Addressing an aging workforce by accelerating workforce development efforts to grow domestic science, technology, engineering, mathematics (STEM), and critical trade skills
- Exploring next-generation technology to increase automation, streamline processes and enhance security

"A healthy defense industrial base is a critical element of U.S. power and the National Security Innovation Base. The ability of the military to surge in response to an emergency depends on our Nation's ability to produce needed parts and systems, healthy and secure supply chains, and a skilled U.S. workforce."

- National Security Strategy of the United States, December 2017

The rise of single and sole source suppliers creates individual points of failure within the industrial base; moreover, fragile domestic suppliers near bankruptcy threaten the extinction of entire domestic industries.





To demonstrate the interwoven aspects of the industrial base, consider the risks facing the aircraft sector, which include subsectors such as fixed-wing, rotorcraft, and unmanned aerial systems. Each sub-sector faces challenges, including long product and system development timelines, high development and qualification costs, and production limitations. The challenges in the aircraft sector are driven by multiple risk archetypes, including single and sole-source suppliers and gaps in U.S.-based human capital with expertise in critical hardware and software design capabilities. These impacts could collectively reduce America's ability to produce and field an aircraft fleet with superior capabilities.

No matter the location, sub-tier suppliers are expected to meet the same supply chain risk mitigation and procurement compliance requirements as first-tier suppliers. The precise level of risk mitigation and procurement compliance required depends on the service or product provided.

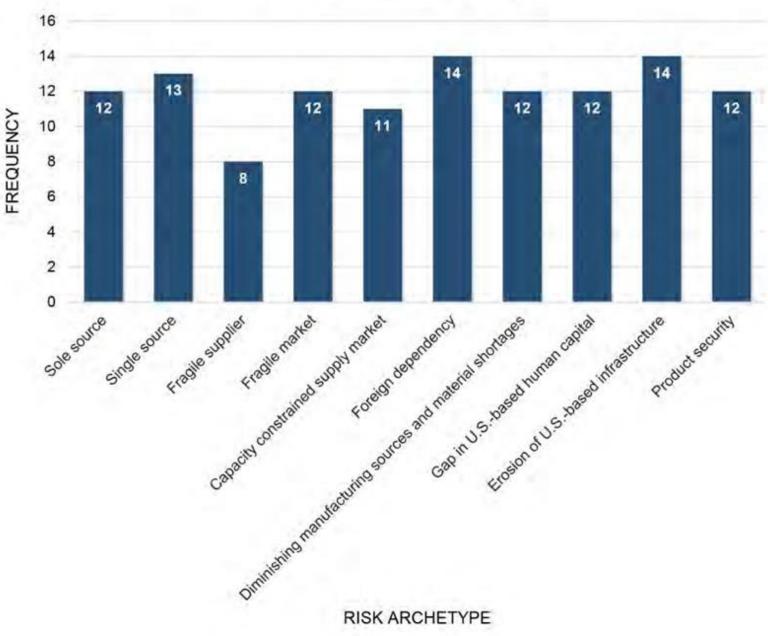
The domestic industrial base includes two categories of producers of goods and services – the private sector and the organic industrial base. The private sector (also known as the commercial sector) includes prime system integrators, major sub-system suppliers, component suppliers, and service providers, from small to large companies.

Across multiple tiers of the supply chain, private sector companies produce defense-specific products exclusively for use by DoD and approved foreign buyers, including platforms, weapons systems, and components hardened for defense uses. Private sector companies may also produce products specially designated as "dual-use," which have both military and nonmilitary applications and may be subject to export control, as well as commercial items without an explicit defense use.7

Through the ongoing globalization of industrial supply chains and



#### Occurrence of the Risk Archetypes within the Sector Working Groups



RISK ARCHETYPE

commodities markets, several countries without formal supply agreements support the manufacturing and defense industrial base with strategic and critical materials, commercial off-the-shelf products, electronics, and some defense components. Countries in this category include Kazakhstan, Singapore, Jamaica, and strategic competitors like China.

This geographically and economically diverse network of providers is of an American industrial base with multiple opportunities for growth and innovation. Still, it is increasingly dispersed and at risk



from both domestic gaps and global forces.

Macro Forces	Definition
Sequestration and uncertainty of U.S. Government spending	Inconsistent appropriations, uncertainty about future budgets, macro- level ambiguity in U.S. Government expenditures, and the effects of the Budget Control Act create market instability
Decline of U.S. manufacturing base capabilities and capacity	Reductions across the U.S. manufacturing and defense industrial base affect the viability of suppliers, overall capacity, and capabilities available domestically
Deleterious U.S. Government business and procurement practices	Challenges working with DoD and other U.S. Government customer including contracting regulations, policies, barriers to entry, qualification challenges, programmatic changes, and other problems, can lead to adverse effects on suppliers
Macro Forces	Definition
Industrial policies of competitor nations	Domestic industrial and international trade policies of competitor nations, notably the economic aggression of China, directly or indirectly degrade the viability, capabilities, and capacity of the U.S National Security Innovation Base
Diminishing U.S. STEM and trade skills	Gaps in American human capital, including a lack of STEM talent and declining trade skills, diminish domestic capabilities to innovate, manufacture, and sustain