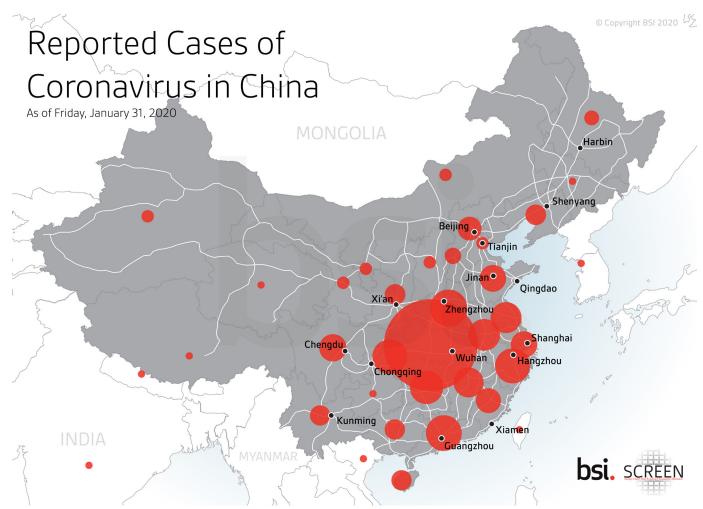
NOVEL CORONAVIRUS (2019 NCOV) BUSINESS IMPACT

January 31, 2020 update

What You Need to Know

- Officials have attributed an outbreak of respiratory illness in Wuhan, China, to the 2019 Novel Coronavirus (nCoV), with cases spreading globally.
- As of January 31, 2020, there are over 9,900 confirmed cases globally and 213 deaths attributed to the virus.
- In reaction to the virus, the government of China has effectively quarantined Wuhan as well as at least 18 other cities, putting travel restrictions in place that are impacting an estimated 56 million people.
- Wuhan's location on the Yangtze River makes it a key transport hub for the movement of goods from China's interior to the coast, as well as other "north-south commercial traffic." Additionally, the city acts as a significant center for pan-Asian supply chains pertaining to electronics, pharmaceuticals, and automobiles.
- Airports worldwide are implementing travel restrictions or canceling flights to mainland China. A growing number of airports are
 conducting health screenings on arrivals from Wuhan or greater China. The U.S. Centers for Disease Control and several multinational
 companies are recommending against any non-essential travel to China due to this outbreak.
- Companies should be aware that enhanced security screenings for coronavirus at any port-of-entry, including seaports, airports, and border crossings, may result in delays for cargo, especially in high-volume areas where container traffic may backlog.
- · Supply chains are very likely to remain impacted by the virus and reactionary policies, leading to disruptions.



Supply Chain Disruption

Supply chain impacts caused by Novel Coronavirus are fluctuating as countries react to the outbreak. Retailers conducting business in Hubei and other impacted areas, however, are likely to see declines in sales and production. One report suggests that some retailers in Japan with strong business ties to Hubei are possibly already seeing such impacts. Wuhan's situation on the Yangtze River makes it a key transport hub for the movement of goods from China's interior to the coast, as well as "north-south commercial traffic." Additionally, the city acts as a significant center for pan-Asian supply chains pertaining to electronics, pharmaceuticals, and automobiles. Barge operators in Wuhan have reportedly confirmed delays to cargo transportation due to fewer ships coming into the port, a likely result of China's lockdown of the city.

As the situation continues to develop, businesses are likely to see further restrictions in the movement of both people and goods through the region. The Chinese government's mandatory quarantine currently includes at least 18 cities until further notice, impacting over 56 million people. Productivity across those quarantined areas will drop considerably as the movement of workers, raw materials, and finished goods are restricted. The continuing crisis is expected to impact the global supply chains, with mechanical, pharmaceutical, fashion, food and beverage, leisure, and travel/logistics sectors all impacted so far. Financial markets will also likely suffer the consequences of the crisis. International organizations that rely on productivity across the region will be impacted through the reduction of available goods, with the pharmaceutical sector being a prime example of supply chain impacts, as a large percentage of active ingredients used by commercial sources to produce finished medicines come from China. With restrictions across the entire supply chain, it is likely that the wider economic impact will continue beyond the resolution of the current health crisis, as end-to-end manufacturing and distribution processes may require a complete restart.

Several multinational retailers have ordered the indefinite closure of some storefronts in Wuhan, with others awaiting further assessments on the advancement of the outbreak to determine the next steps for their operations in the city and the broader Hubei region. One report claims that the Chinese government has ordered the closure of many manufacturing companies operating in Wuhan until February 8. If these closures are extended past this date, then some suppliers will reportedly be "unable to fulfill orders," which will likely lead to product shortages.

Some producers are already experiencing short-term effects because of the coronavirus, specifically with regards to medical mask products. Multiple reports indicate that several cities worldwide are seeing supply shortages of medical masks as coronavirus fears fuel demand, including Shanghai, Toronto, New York City, Chicago, parts of Central Texas, and parts of Australia. As fears over the virus outbreak intensify, other shortages of medical supplies, medications, or disinfectants may occur as manufacturers adjust to meet any accelerated demand.

Companies should be aware that enhanced security screenings for coronavirus at any port-of-entry, including seaports, airports, and border crossings, may result in delays for cargo, especially in high-volume areas where container traffic may backlog. As companies implement business continuity plans, they should also be aware of possible security risks, such as heightened risk of theft that can result in some areas from idling trucks waiting in high-risk areas.

Organizations with commercial interests in the affected areas are recommended to initiate their alternate supply chains and business continuity plans across the region.



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David is a senior security executive with international experience across multiple specialist sectors, including Risk Management, Supply Chain Security, Critical Infrastructure Protection, and Business Development. He assists public and private sector organizations to effectively manage and mitigate their exposure to risk through transferring deep subject matter knowledge empowering professionals to manage risk; creating measurable, scalable, and sustainable solutions; and embracing industry standards and best practices.



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Paul has an extensive track record of developing and implementing risk management strategies for clients across a wide range of sectors and geographical arenas. His approach focuses on identifying critical areas of need within organizations and developing proactive and fully integrated paths to resilience throughout the supply chain. Paul continues to support clients by helping them to balance the need for security and risk management, with the operational needs of the organization, across global supply chains. His approach is about building capability within and empowering decision makers to act quickly with a full appreciation of risk in relation to opportunity.

Recommended Immediate Business Response

BSI recommends the following initial steps to protect your people and business interests:

- 1. Establish who you have in the area and who has recently traveled to the area.
- 2. Inform all staff of the immediate action plan should they experience symptoms, including what resources are available to them.
- 3. Review business impact analysis for interruptions to operations linked to China, or other impacted areas.
- 4. Prepare your emergency communication team to make announcements throughout the crisis, to internal staff and external resources, as the situation develops.
- 5. Communicate to all your staff, clients, investors, and suppliers, informing them of potential impacts to your business and continuity action plans that are being implemented.
- 6. Communicate your business continuity plans to your suppliers and service providers, guiding them on how and when they should continue to operate alongside or within your organization.
- 7. Implement your work at home procedures of your business continuity plan, for staff who are identified as being at risk from exposure. Communicate the work at home policy for other staff who feel they are not able to report to their worksite.

Travel Restrictions

Travel restrictions are severely impacting movement in or around Hubei province, with residents remaining in their homes for all but essential movement. There is no expected traffic in or out of the identified cities for the foreseeable future, although some international government agencies have begun planning extrication measures for citizens caught in impacted areas.

As the situation continues to develop, many international advisory agencies are recommending against traveling to/from the wider Hubei Province while also offering wider travel and health advice for those impacted by the crisis.

Mongolia and North Korea have reportedly closed their borders with China in response to the growing concerns of the outbreak, denying all vehicles and pedestrians from entering. Officials in Hong Kong and Malaysia have barred all visitors from Hubei.

International airports around the world are increasingly implementing additional health screenings for passengers coming from Wuhan and other Chinese cities. In the United States, all passengers returning from the area will be re-routed through one of five screening centers at New York, Chicago, Atlanta, Los Angeles, and San Francisco, before being allowed to enter the United States. Across Europe, quarantine measures have been imposed for passengers from high risk-areas. The United Kingdom has suspended flights to and from mainland China, with those who are evacuated from Wuhan expected to be placed in quarantine for two weeks. Repatriation flights are continuing for citizens of Australia, Japan, New Zealand, South Korea, Malaysia, Philippines, the US, and EU countries. Australia plans to quarantine its 600 returning citizens for two weeks on Christmas Island.

Thailand's international airports in Bangkok, Krabi, Chiang Mai, and Phuket are reportedly screening arrivals from Wuhan, Beijing, and Shenzhen. Hong Kong International Airport has implemented health screenings for all trains and flights from Wuhan. All inbound flights from China at Singapore's Changi Airport will be included in these screenings as well.

Airlines around the world are implementing travel restrictions or canceling flights to mainland China. These include Delta Airlines, American Airlines, United Airlines, Cathay Pacific, Air Canada, Lion Air, Ural Airlines, China Airlines, and British Airways. As the spread of the virus continues globally, further travel restrictions and additional security screenings at ports of entry can be expected.

Transmission, Spread, and Symptoms

The Novel Coronavirus is a new strain of virus that is easily spread from person to person, causing serious illness in many of the infected.

Viruses spread by droplets of infected respiratory secretions, which are generally projected when a person talks, coughs, or sneezes. One of the most effective means of transmitting the virus is through hand-to-face contact after a contaminated person or surface has been touched. The spread of a virus may also be possible through fine particles or aerosols, but it is unclear if the Novel Coronavirus can be transmitted in this manner, or indeed how resilient the virus is within the environment.

As of January 31, 2020, China's National Health Associate reported the number of deaths caused by the Novel Coronavirus has exceeded 213 with over 9,700 confirmed cases in the country. Hubei province's city of Wuhan, where the outbreak originated, includes more than half of the total number of confirmed cases so far. In an effort to contain the spread of the virus, the Chinese government has quarantined at least 18 cities, completely cutting off all incoming and outgoing public transportation into the areas in a measure affecting over 56 million people.

There are currently (as of January 31, 2020) 26 other countries with confirmed cases of the virus:

China: 9,783 confirmed cases **Thailand**: 19 confirmed cases Japan: 15 confirmed cases **Singapore**: 13 confirmed cases Hong Kong: 12 confirmed cases

South Korea: 11 confirmed cases Taiwan: 10 confirmed cases Australia: 9 confirmed cases Malaysia: 8 confirmed cases

Macau: 7 confirmed cases **US**: 6 confirmed cases

Germany: 5 confirmed cases France: 5 confirmed cases

UAE: 4 confirmed case

Canada: 3 confirmed cases Vietnam: 2 confirmed cases

Italy: 2 confirmed cases Russia: 2 confirmed cases **UK:** 2 confirmed cases

Cambodia: 1 confirmed case Nepal: 1 confirmed case Sri Lanka: 1 confirmed case Finland: 1 confirmed case

India: 1 confirmed case

Philippines: 1 confirmed case **Sweden:** 1 confirmed case

The full range of symptoms are not comprehensively defined, but currently, those infected with the Novel Coronavirus present with flulike symptoms including a fever, a cough, or difficulty breathing. The current evidence indicates that most cases appear to be mild, and those who have died reportedly appeared to have pre-existing health conditions. There is, however, a concerning incubation period of anything up to 14 days before symptoms are displayed, which in turn complicates the process of identifying, quarantining, and treating infected people before they can spread the virus.

Reported Cases of Coronavirus Globally As of Friday, January 31, 2020 **bsi.** screen

Data sources: WHO, CDC, NHC, and DXY

This document was originally produced on January 30, 2020 and updated on January 31, 2020 by BSI Intelligence and Advisory Teams. BSI Advisor Mr. Paul Raw (paul.raw@bsigroup.com) and BSI Advisor Mr. David Fairnie (David.fairnie@bsigroup.com) with the Advisory Team collaborated with BSI Intelligence to produce the below intelligence and recommendations.

About BSI SCREEN Intelligence

Supply Chain Risk Exposure Evaluation Network (SCREEN), is BSI's web-based, comprehensive global supply chain intelligence system. SCREEN is the most complete, publicly available Supply Chain Security, Corporate Social Responsibility, Food Safety, and Business Continuity intelligence and analysis resource used to measure country level risk factors through BSI's 25 proprietary country level supply chain risk ratings. SCREEN's unique, proprietary global supply chain risk data and analysis helps organizations identify and understand where their supply chain risks exist. SCREEN generates trade interruption updates, BSI-authored special reports on major disruption incidents and trends, countermeasure programs, and risk mitigation best practices to help protect supply chains worldwide. SCREEN's intelligence provides organizations with full transparency of country risks and helps them to make intelligent risk-based decisions that drive resilience.

Interactive Risk Maps

Each proprietary risk indicator is conveniently displayed for over 200 countries through SCREEN's global risk mapping views. For every indicator, a country is assigned a rating of Low, Guarded, Elevated, High, or Severe. This rating system allows users to quickly identify and categorize the threats to their supply chain and address them quickly.

Automated Notifications

SCREEN provides users the ability to stay current and up to date with breaking news and changing conditions around the world that impact the integrity of their supply chain. Users are able to subscribe to the notifications for specific locations and subject areas that concern them the most.

Custom Report Builder

SCREEN's custom country report builder provides users with more control over the areas that are represented in the report. Users can easily pull and compare reports for multiple countries, threat assessments, and commodities tagged throughout the SCREEN system instantly.

Spotlight News

SCREEN's Spotlight News provides data and analysis on the most pressing global incidents on a daily basis. Each update encompasses a general summary of the incident and BSI's own analysis of the incident. The analysis provides the risk rating of the associated country and the explanation of the rating to help you better understand the country level threats and trends.

Custom Intelligence Services

BSI is now offering custom intelligence specific to your organization's supply chain. This innovative feature allows us to deep-dive into geographies, commodities, and subject areas that fit your needs and create custom reports, threat ratings, and analyses. For more information on these solutions and how they can benefit your organization, please contact our team at supplychain@bsigroup.com.

Additional Services & Solutions

Supplier Compliance Manager (SCM): BSI's automated self-assessment and audit analysis solution that quantifies and tracks supplier risk and compliance through various assessment methods to ensure your supply chain, brand, and reputation are protected.

Advisory Services: BSI's experienced risk management professionals leverage their knowledge and SCREEN intelligence to help organizations effectively identify, manage, and mitigate risk and develop robust management programs.

Training Services: Our customizable training services help develop a deeper understanding of supply chain security, corporate social responsibility, food safety, and business continuity risks and how to quickly respond and proactively manage them.

Auditing Services: Our services provide organizations with complete visibility into their suppliers' practices and procedures worldwide. Our audits provide your organization cost-effective assurance that your suppliers are not exposing your brand.



