OPERATIONAL RESILIENCE

Providing smart, proactive solutions throughout a firm’s journey to operational resilience
In the summer of 2018, in response to recent outages impacting the financial sector and growing cyber concerns, the Bank of England released a discussion paper titled *Building the UK Financial Sector’s Operational Resilience*. Additionally, in March 2019 the Monetary Authority of Singapore (MAS) published discussion papers on Technology Risk Management and Business Continuity Management.

Important to any financial institution in today’s environment of rapid change, operational resilience continues to be top of mind for industry executives and supervisory authorities around the world.

**Operational Resilience:** The ability of an organization to withstand adverse changes in its operating environment and continue the delivery of business services and economic functions.

**WHY IS IT IMPORTANT?**

- Dynamic landscape increases the risk of “extreme but plausible” events
- Impacts the stability of the financial system as well as the viability of firms
- Key focus area for the regulators
- Resilience events can increase risk and threaten growth
- Enhancing a firm’s resilience can create long-term competitive advantages and mitigate cost

**WHO DOES IT IMPACT?**

- Large firms whose activity threatens financial stability
- Smaller firms where activity is big enough to threaten the firm’s safety and soundness
- Third-party providers of critical business or sector-level services
Protiviti is one of SIFMA’s 10 Premium Associate Members. Through this enhanced level of participation, Protiviti consultants actively engage with SIFMA committees and working groups, share insights and expertise on crucial industry developments, speak at conferences and events, and contribute to SIFMA’s advocacy efforts for effective and resilient capital markets.

SIFMA is the leading trade association for broker-dealers, investment banks and asset managers operating in the U.S. and global capital markets. On behalf of the industry’s nearly 1 million employees, they advocate on legislation, regulation and business policy, affecting retail and institutional investors, equity and fixed income markets, and related products and services. SIFMA serves as an industry coordinating body to promote fair and orderly markets, informed regulatory compliance, and efficient market operations and resiliency. It also provides a forum for industry policy and professional development. SIFMA, with offices in New York and Washington, D.C., is the U.S. regional member of the Global Financial Markets Association (GFMA).
### The Six Steps to Gaining Operational Resilience

<table>
<thead>
<tr>
<th>Step</th>
<th>Description</th>
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<tr>
<td><strong>01</strong></td>
<td><strong>Identify Critical Business Services.</strong> Understand your business services and formalize those that are critical. Critical business services are those that have been identified through separate regulatory obligations, or meet established criteria that demonstrate a broader economic importance beyond the firm.</td>
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<td><strong>02</strong></td>
<td><strong>Establish Impact Tolerance.</strong> Establish impact tolerances for critical business services. Extending beyond traditional recovery time, impact tolerance represents the point at which an interruption (or resilience event) threatens the viability of business services.</td>
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<td><strong>03</strong></td>
<td><strong>Understand Economic Impact.</strong> Understand the impact of an operational resilience event on the financial sector and the broader economy. Create processes and procedures to minimize any negative impact.</td>
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<td><strong>04</strong></td>
<td><strong>Implement Appropriate Governance.</strong> Establish proper governance functions and implement a resilience program based upon the needs of the organization’s critical business services.</td>
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<td><strong>05</strong></td>
<td><strong>Test &amp; Improve.</strong> Test the “extreme but plausible” scenarios to better understand realistic recovery times versus established impact tolerance. Testing will indicate where investment in technology or processes is needed in order to stay within tolerances.</td>
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<td><strong>06</strong></td>
<td><strong>Continue to Evolve Foundational Elements.</strong> Continue to improve business, cyber, third-party and technology resilience — foundational elements of a solid resilience program that should be supported with the appropriate “tone from the top.”</td>
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Common Challenges

THE CHALLENGE

As with any new regulation, there is uncertainty over the proper meaning and how an individual organization will be affected. Given the amount of regulations financial firms face, another regulatory obligation would only cause unnecessary stress.

Firms must contend with new terms under operational resilience. Critical business services must be defined. Impact tolerances must be determined. Economic impact must be assessed. Clarity on these terms is challenging at the moment, and inappropriate definitions can lead to misaligning work efforts with regulatory obligations.

While companies have established disaster recovery and business continuity programs, they struggle to provide true front-to-back process views of their business services. The process to align thousands of systems and processes to business services is a challenge.

Established recovery time objectives (RTOs), often given in minutes or hours for critical business processes, are not realistic in tail-risk scenarios, which can be catastrophic. This is particularly true in certain cyber scenarios where uncertainty of breadth of compromise and subsequent containment draw out realistic timelines. These RTOs and expectations may differ between business leaders, senior leadership and the board and need to be addressed.
Operational resilience is not an entirely new obligation; it is mostly a repackaging of existing obligations. Firms can utilize existing work to satisfy 85% of the requirements, alleviating the burden of approaching operational resilience as new.

Protiviti’s role in defining the industry’s response to operational resilience provides us a unique perspective on how to define the new terms outlined by the Bank of England. Our experts can help financial organizations define critical business services, establish impact tolerances and understand economic impact in alignment with the objectives of the bank.

In order to establish resilience services, it is critical that a front-to-back view exists. Protiviti has established methodologies to leverage prior work and build and maintain these views, including focus on key considerations such as dependencies and historical processes that are not efficient or cost-effective.

As part of the process to establish realistic impact tolerances, Protiviti will inform the board on actual time-to-recover capabilities by using a series of “extreme but plausible” scenarios. This process will educate key stakeholders on real-world scenarios the firm may face and identify potential funding needs to remain within defined impact tolerances.
Service Offerings

HOW WE CAN HELP

01 Resilience Assessment
Assess the firm’s current practices with regard to operational resilience, including an assessment of the foundational elements.

02 Business Services Formalization
Analyze existing business services to determine criticality, establish initial impact tolerance methodology and create economic impact scenarios for business services defined as critical.

03 Resilience Program Implementation
Design and implement a resilience program leveraging Protiviti’s framework, with a focus on governance and alignment with foundational elements.

04 Maturing Foundational Elements

05 Resilience Scenario Testing
Challenge existing resilience practices through enterprisewide scenario testing to simulate “extreme but plausible” scenarios impacting critical business services of the firm.

06 Resilience Assurance
Develop overall operational resilience internal audit plans, ingrain operational resilience into existing audits and provide assurance over the operational resilience program.
Assessment

HOW WE CAN HELP

The journey to operational resilience starts with understanding the current state of the firm’s operational resilience and knowing how many existing capabilities can be leveraged to support resilience efforts. Through our Operational Resilience Assessment offering, Protiviti experts will partner with you across the following key steps:

01 Initial review
Review existing capabilities, including foundational elements and additional components of an operational resilience program.

02 Develop operational resilience roadmap
Build a prioritized operational resilience roadmap based on assessed maturity and need.

03 Provide recommendations to meet desired maturity levels
Provide actionable plans and additional resourcing and organizational recommendations/suggestions.
Critical Business Services Analysis and Impact Tolerance Integration

HOW WE CAN HELP

Protiviti will partner with your organization to analyze existing business services to determine criticality, establish initial impact tolerance methodology, and create economic impact scenarios for business services defined as critical.

DEFINE BUSINESS-CRITICAL SERVICES
Protiviti employs a framework for establishing if a business service will be deemed as critical or noncritical based upon:

- Regulatory filings: Utilize and align with historical regulatory filings to ensure proper designation of the business service.
- Financial and market metrics: Provide a quantitative analysis to support conclusions of the regulatory review.

ESTABLISH IMPACT TOLERANCE OF CRITICAL SERVICES
Protiviti experts will help your firm understand the impact tolerance of a critical service by establishing:

- Cost of a resilience event as a function of time.
- Estimation of the maximum tolerable period of downtime of the critical business service.

UNDERSTAND ECONOMIC IMPACT ACROSS STAKEHOLDERS
Protiviti works with your firm to understand the economic effect on stakeholders of a resilience event. Due to the dynamic nature of some events and many variables in how stakeholders may be affected, there are significant challenges in fully understanding an event’s economic impact. Firms need to understand the impact and the necessary processes and procedures beyond recovery-time objectives to ensure that an operational resilience event causes minimum economic impact.
Resilience Program Implementation and Maturing Foundational Elements

**HOW WE CAN HELP**
Protiviti will help your firm design and implement an overall resilience program, with a focus on governance and alignment with foundational elements.

| How is operational resilience governed effectively within the organization? | RESILIENCE PROGRAM GOVERNANCE | • Collaboration  
| | | • Oversight  
| | | • External Communications  
| | | • Board Reporting  
| | | • Enterprise Orchestration  
| | | • Sector Coordination  
| | | • Training & Awareness  
| | | • Crisis Management  
| What business services are critical? What duration can they be interrupted? | BUSINESS SERVICES | • Define & Prioritize Critical Business Services  
| | | • Establish & Monitor Impact Tolerances  
| | | • Define Economic Impact  
| Are the proper foundational elements in place and mature enough to support resilience objectives? | FOUNDATIONAL ELEMENTS | • Business Resilience  
| | | • Cyber Resilience  
| | | • Third-Party Resilience  
| | | • Technology Resilience  
| Can the organization demonstrate resilience through substantive testing of “extreme but plausible” scenarios? | ASSURANCE | • Assess  
| | | • Mature  
| | | • Orchestrate  
| | | • Assure  
| | | • Evolve  
| | Recurring Testing Scenarios  

Recurring Testing Scenarios
Resilience Scenario Testing

HOW WE CAN HELP
Protiviti will partner with your organization to challenge existing resilience practices through enterprisewide scenario testing to simulate “extreme but plausible” scenarios impacting critical business services of the firm. Our scenario testing process is outlined below:

INTERVIEWS AND WORKSHOPS
We utilize interviews and facilitate workshops to drive insight and agreement on the potential scenarios for a diverse audience, including board members.

DEFINE INHERENT RISK
We help define inherent risk to an organization while holding objective discussions on mitigating controls, allowing a clear view of residual risk to be developed.

 LEVERAGE EXISTING TOOLS
Easy-to-use tools are leveraged as this information is developed and is provided for the organization to use in future reviews of, and updates to, your threat landscape.

 DETERMINE HIGHEST SECURITY PRIORITIES
We will develop a clear picture of your highest security priorities in a meaningful context that enables a more efficient and effective set of next steps to be developed.
Resilience Assurance

HOW WE CAN HELP
Our internal audit experts will partner with your organization to develop overall operational resilience internal audit plans, incorporate operational resilience into existing audits, and provide assurance over the operational resilience program.
ABOUT PROTIVITI

Protiviti is a global consulting firm that delivers deep expertise, objective insights, a tailored approach and unparalleled collaboration to help leaders confidently face the future. Protiviti and our independently owned Member Firms provide consulting solutions in finance, technology, operations, data, analytics, governance, risk and internal audit to our clients through our network of more than 75 offices in over 20 countries.

We have served more than 60 percent of Fortune 1000® and 35 percent of Fortune Global 500® companies. We also work with smaller, growing companies, including those looking to go public, as well as with government agencies. Protiviti is a wholly owned subsidiary of Robert Half (NYSE: RHI). Founded in 1948, Robert Half is a member of the S&P 500 index.

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