



CYBERSECURITY IN OIL & GAS

UPSTREAM OPERATIONS
EXPLORATION & PRODUCTION



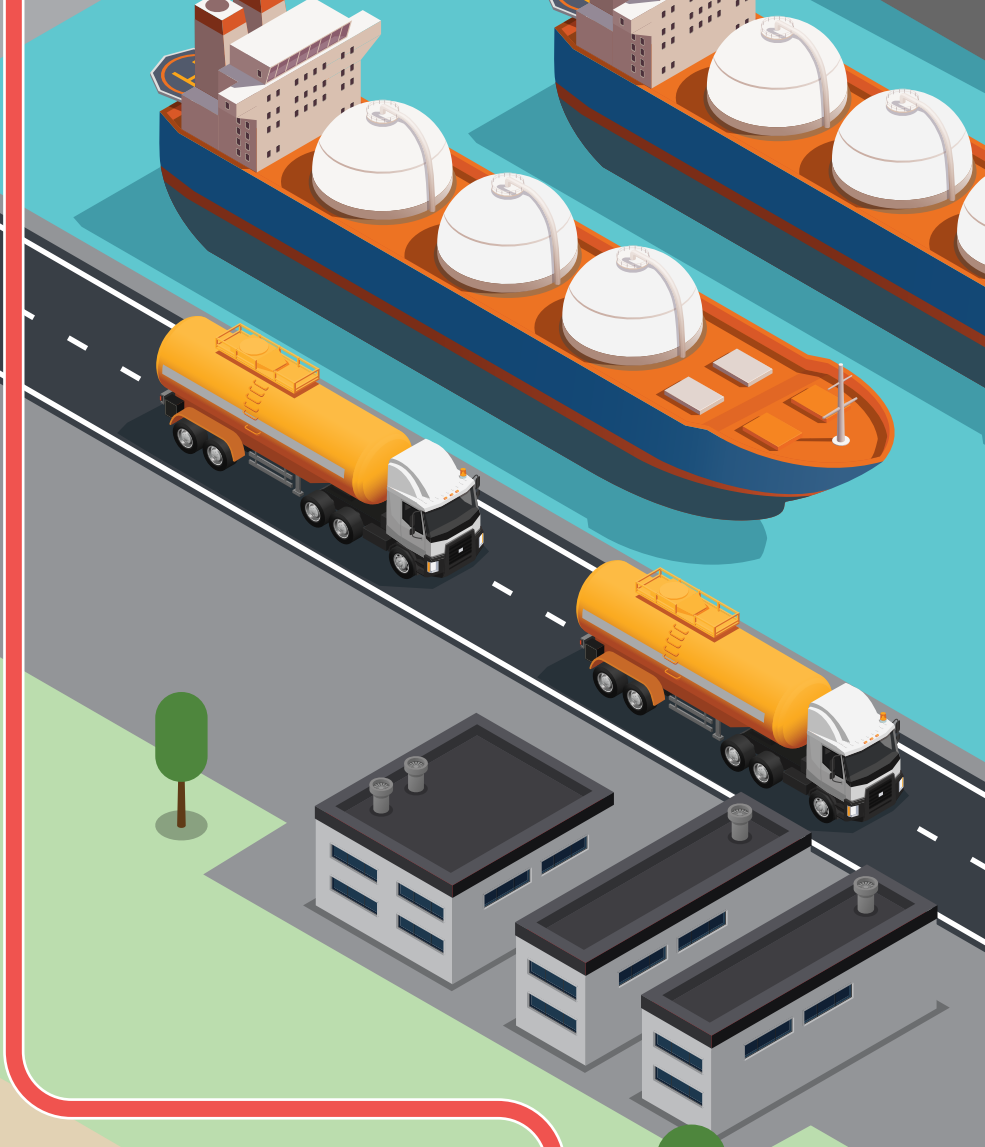
- UPSTREAM OPERATIONS**
EXPLORATION & PRODUCTION
- IoT and OT Penetration
 - Threat Modeling and Risk Assessment
 - Architecture and Design Reviews
 - Cybersecurity Incident Response Tabletop Exercises

MIDSTREAM OPERATIONS
TRANSPORTATION & STORAGE



- MIDSTREAM OPERATIONS**
TRANSPORTATION & STORAGE
- Infrastructure Security Consulting
 - Attack Simulations
 - Cybersecurity Assessment Plan Development
 - Cloud Security Configuration Reviews
 - Penetration Testing

DOWNSTREAM OPERATIONS
REFINING AND DISTRIBUTION



- DOWNSTREAM OPERATIONS**
REFINING AND DISTRIBUTION
- Application Security Consulting
 - Comprehensive Code Reviews
 - Cloud Security Assessments
 - Employee Training and Cybersecurity Incident Response Tabletop Exercises

CYBERSECURITY IN OIL & GAS

UPSTREAM OPERATIONS

EXPLORATION & PRODUCTION

- **IoT and OT Penetration Testing:** Simulate real-world attacks to identify vulnerabilities in drilling equipment and remote monitoring systems.
- **Threat Modeling and Risk Assessment:** Conduct comprehensive threat modeling to anticipate potential threats and mitigate risks in exploration and production systems.
- **Architecture and Design Reviews:** Evaluate and secure the design of control systems and critical infrastructure to prevent breaches.
- **Cybersecurity Incident Response Tabletop Exercises:** Train teams in rapid, effective responses to incidents, ensuring operational resilience.

MIDSTREAM OPERATIONS

TRANSPORTATION & STORAGE

- **Infrastructure Security Consulting:** Offer consulting services to protect pipeline control systems and storage facilities, aligned with TSA Security Directives and API Standard 1164.
- **Attack Simulations:** Conduct detailed simulations to test the resilience of OT systems managing transportation and storage.
- **Cybersecurity Assessment Plan Development:** Assist in creating and annually updating cybersecurity assessment plans in line with TSA requirements.
- **Cloud Security Configuration Reviews:** Analyze and enhance cloud infrastructure used for data management in midstream operations.
- **Penetration Testing:** Detect vulnerabilities within midstream OT environments to secure pipelines, pump stations, and storage terminals.

DOWNSTREAM OPERATIONS

REFINING AND DISTRIBUTION

- **Application Security Consulting:** Secure Distributed Control Systems (DCS) and Industrial Control Systems (ICS) in refining and distribution facilities.
- **Comprehensive Code Reviews:** Identify and remediate vulnerabilities in software that supports refining processes.
- **Cloud Security Assessments:** Strengthen cloud-based systems integral to downstream logistics through configuration reviews and vulnerability analysis.
- **Employee Training and Cybersecurity Incident Response Tabletop Exercises:** Equip teams with skills to manage and respond to cyber threats effectively.

MEETING REGULATORY STANDARDS

- **TSA Security Directives:** Compliance with TSA mandates, such as submitting an annual Cybersecurity Assessment Plan and conducting annual incident response tests.
- **ISO/IEC 27001 and ISA/IEC 62443 Compliance:** Support organizations in aligning with these global standards to secure IT and OT environments.
- **NIST and API Standards:** Ensure adherence to NIST guidelines and API Standard 1164, which cover critical infrastructure protection.

