LAM·LHA

INNOVATION ACCELERATED

ADVANCED SECURITY TECHNOLOGY IN AVIATION

2nd April 2019, WINS

THE THREAT HAS EVOLVED

HIJACKING

AIRBORNE THREAT

EXPLOSIVES

HME/CBRN

DIFFERENT VECTORS USED

PASSENGERS

STAFF/INSIDER

FREIGHT/SHIPMENTS

DRONES

KEY CHALLENGES

Traffic growth :

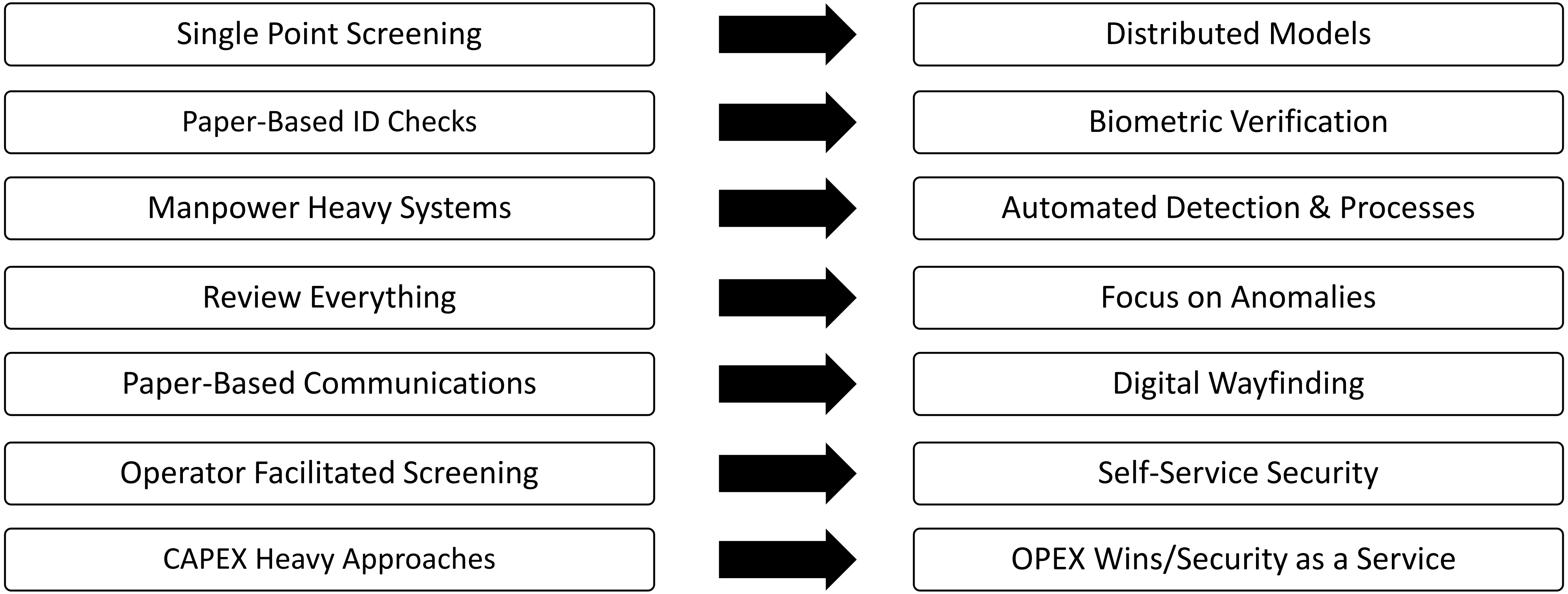
- Air traffic to more than double in the next 20 years
- Limited Infrastructure expansion

Cost of disruption:

- LGW drone incident cost over 50Mio GBP
- 1 minute of delay costs the airlines about 100 EUR

LAM·LHA
INNOVATION ACCELERATED

NEW APPROACHES & ADVANCED CAPABILITIES



Single Point Screening → Distributed Models

Paper-Based ID Checks → Biometric Verification

Manpower Heavy Systems → Automated Detection & Processes

Review Everything → Focus on Anomalies

Paper-Based Communications → Digital Wayfinding

Operator Facilitated Screening → Self-Service Security

CAPEX Heavy Approaches → OPEX Wins/Security as a Service

ENHANCED EXPLOSIVE / CHEMICAL DETECTION

- CT systems based on 3D technology from medical sector
- Mass Spectrometry applications for explosive and chemical trace detections
- Integration for person screening (enhanced security scanners)

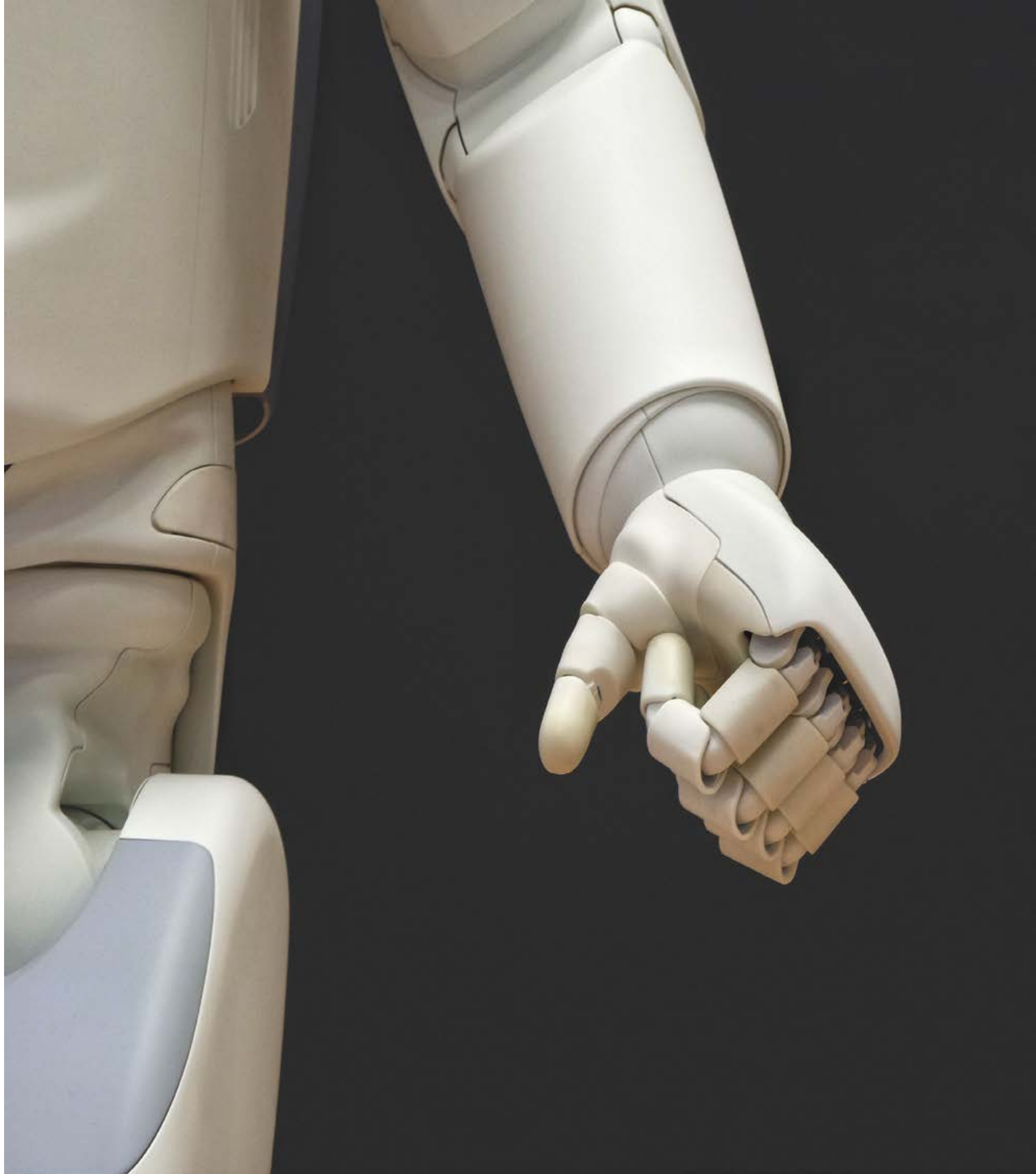
➢ Better detection allows for less divestment

LAM·LHA
INNOVATION ACCELERATED

POTENTIAL OF ARTIFICIAL INTELLIGENCE

- Automating Detection : Security Scanners, baggage screening systems
- Complementing explosive/chemical detection systems
- Adaptability to the threat
- Operational effectiveness: enhance case of remote image processing - operators to focus on actual difficult cases

LAM·LHA
INNOVATION ACCELERATED



INTEGRATING SECURITY IN OPERATIONS

- Behavior Detection:
  - ✓ For insider threat (recruitment and for line managers)
  - ✓ For passenger screening or terminal operations

- Flow Management:
  - ✓ Identify vulnerabilities and bottlenecks in infrastructure
  - ✓ Integrate threat identifications
  - ✓ Commercial added value

FOCUS ON IDENTITY MANAGEMENT

- Increased use of biometrics :
  - ✓ Integrating business processes with biometrics token
  - ✓ Linked to government databases / allowing constant vetting (badges or passenger data)

- Allow differentiated screening :
  - ✓ Reduce predictability of the system
  - ✓ Adapt screening requirements to the situation

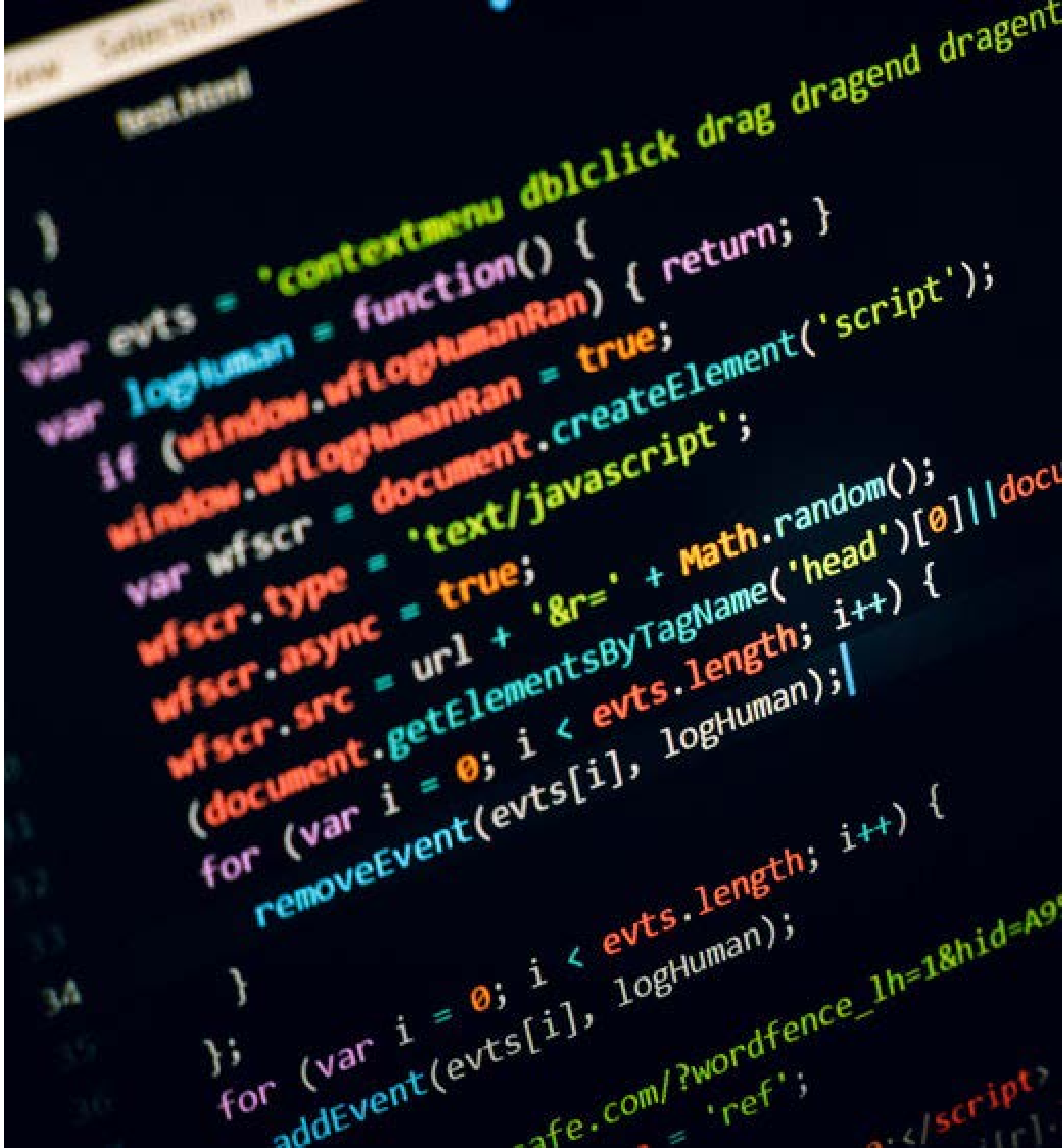
LAM·LHA
INNOVATION ACCELERATED

MANAGING THREAT AND OPPORTUNITY: DRONES

- ✓ Distinguish between legitimate operations and malicious intentions
- ✓ Coordination between different actors in and around the perimeter
- ✓ Focus on risk assessment and response plan – not just on anti-drones technologies

AVOIDING NEW VULNERABILITIES: CYBERSECURITY

- ➢ Move from proprietary systems to COTS components
- ➢ More automatization and networking of systems
- ➢ Distinguish between general business vulnerabilities and specific operational threats



```
}
});
var evts = 'contextmenu dblclick drag dragend dragent
var logHuman = function() {
    if (window.wfLogHumanRan) { return; }
    window.wfLogHumanRan = true;
    var wfscr = document.createElement('script');
    wfscr.type = 'text/javascript';
    wfscr.async = true;
    wfscr.src = url + '&r=' + Math.random();
    (document.getElementsByTagName('head')[0]||docu
    for (var i = 0; i < evts.length; i++) {
        removeEvent(evts[i], logHuman);
    }
};
for (var i = 0; i < evts.length; i++) {
    addEvent(evts[i], logHuman);
afe.com/?wordfence_lh=1&hid=A9
= 'ref';
</script>
```

LAM·LHA
INNOVATION ACCELERATED

CONCLUSION

Technology is not the only answer

More information sharing necessary…

…for effective risk-based security

LAM·LHA
INNOVATION ACCELERATED

CONTACT

Marie-Caroline LAURENT
Director, LAM LHA
mclaurent@lam-lha.com
+32 474 98 03 98

LAM-LHA.COM