

LON3 CyrusOne Data Center

700 Stirling Road Slough SL1 4ST United Kingdom



Introduction

CyrusOne LON3 is a brand new purpose built state-of-the art data center offering cloud providers, systems integrators and multinational corporations customised, secure and resilient data center solutions within a key business hub.

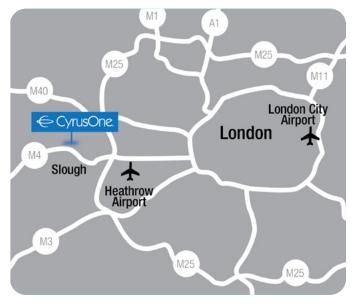
Strategically located in Slough, one of the UK's premier data centre locations, the facility will ultimately deliver 3,600 sqm (38,750 sq ft) of world-class technical space with an IT load of 9 MW, with each data suite customised to individual client specifications.





Overview

- 3,600 sqm (38,750 sq ft) of technical space within one building on two floors
- 9 MW IT load to the facility
- Highly resilient, concurrently maintainable power and cooling to Tier III
- Dedicated electrical plant to each floor
- Ultra-low PUE through the use of Indirect Adiabatic Air Cooling
- 1,400 mm return air plenum with 3,400 mm clear height in the data hall
- Active / Active dual redundant power supplies of 15 MVA
- Carrier neutrality and diverse fibre connectivity to active A+B Meet Me Rooms from multiple providers
- Secure managed delivery bay with 3 tonne goods lift
- Multi-layer industry leading levels of physical and electronic security with 24/7 year round onsite support



Technical Specifications

POWER

- Mains power supplied via 100% rated A&B 33 kV incomers diversely routed active / active with a capacity of 15 MVA
- All IT power metered and charged as consumed
- 4.5 MW distributed redundant topology with 4 independent and compartmentalised blocks
- 99.999% reliability with the ability for concurrent maintainability
- IT power supplies are derived from primary and reserve feeds from each block via STS's creating a meshed IT distribution topology between all 4 blocks
- Distributed redundant UPS topology with 10-minute battery back-up as standard two UPS systems per block
- Fully rated distributed redundant LV back-up generators with 48-hour fuel autonomy, capable of continuous running
- Re-fuelling contracts to ensure timely replacement

COOLING

- N+1 Indirect Adiabatic Air Cooled solution as standard
- Ultra-low PUE due to cooling solution and optimum operating conditions as standard
- Cooling infrastructure individually managed and linked to BMS
- Independently regulated temperature and humidity
- A+B Power Supplies to cooling equipment for full redundancy (local ATS's)

CONNECTIVITY

- Carrier neutral access via diverse active A+B Meet Me
 Rooms to multiple telecommunication providers
- Diverse cable routing into facility to dual MMR's
- Strict cable management policy

ENERGY EFFICIENCY

- Scalable UPS capable of ECO and sequence modes
- Scalable Indirect Adiabatic Air Cooled units with free cooling capacity
- Variable speed drive adiabatic fans
- ASHRAE T9 hall conditions
- Air cooled plant rooms with variable speed fans
- Ultra-low PUE through the use of Indirect Adiabatic Cooling

FIRE DETECTION AND SUPPRESSION

- Three stage fire detection systems into data halls and UPS plant areas
- VESDA (Very Early Smoke Detection Apparatus) in data halls and UPS plant rooms for early warning
- Fire detection in all rooms, ceiling return air plenums and in voids as required
- Gas suppression to data halls and UPS rooms with dedicated bottles
- Double knock approach gas suppression to all areas, single zone activation
- Fire detection and suppression systems interconnected to central BMS
- Building & Energy Management Systems (BMS & EMS)
- Power and building monitoring systems to provide alarms
- Power surge management
- 24/7 year round on-site M&E engineers undertaking Planned
- Preventative Maintenance (PPM) programmes
- Real-time monitoring of electrical and mechanical systems

REGULATORY COMPLIANCE CERTIFICATION

- ISO 9001: Quality Management
- ISO 14001: Environmental Management
- ISO 45001: Occupational Health and Safety
- ISO 27001: Information Security Management
- SOC2: System and Organization Control
- PCI: Payment Card Data Security Standard

SECURITY

- 3 metre high secure perimeter fence to CPNI base specification
- External CCTV and Geoquip trembler wire to fence
- Vehicle lock to site entrance and delivery bay with PAS68 rated gates to protect from vehicle attack
- 24/7 year round on-site security located in secure control room
- Extensive CCTV and access control throughout the facility
- Progressive layers of security to restrict access through the site
- Mantraps with biometric readers into data halls if required

STATE OF THE ART ENGINEERING

- Air cooled UPS modules
- Sequence and variable mode UPS modules, dedicated to each tenant / hall
- Dedicated main plant for each customer
- Integrated A&B MV Infrastructure along with distributed LV generators for increased resilience
- Phasing to allow for subtle changes in each hall / tenant specification / requirements
- Remote intelligence control algorithms to remove reliance on central BMS

Floor Plan

