DatAIM

DATWYLER AUTOMATED INFRASTRUCTURE MANAGEMENT (AIM) SYSTEM

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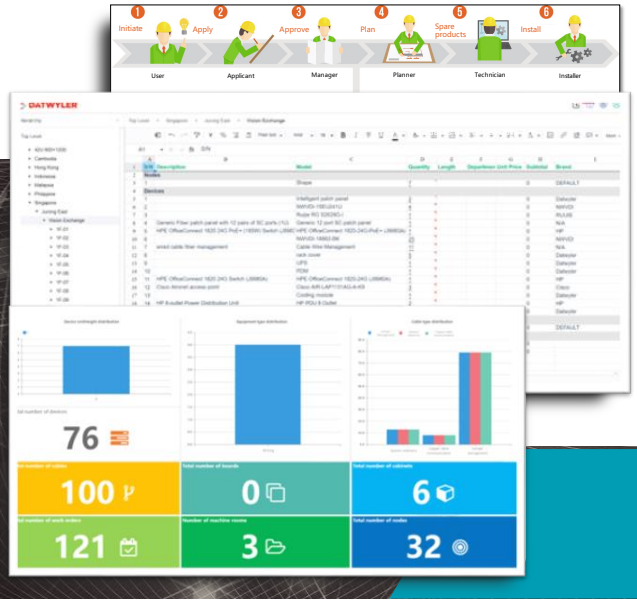
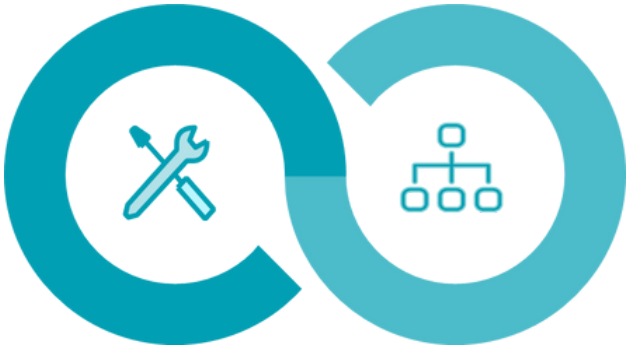


DatAIM is an intelligent management software developed by Datwyler to assist in optimising usage and future-proof expansion of assets for network infrastructure.

DatAIM helps the operation and maintenance personnel to easily manage the complex network infrastructure and thus establish a more interconnected world with unobstructed information flow.

Digital Twin Technology + Management Mode Innovation



Resource visualisation

By adopting a unified data model, it is possible to easily create and maintain a visual record database that tracks the physical layer resources of the infrastructure and their relationships in real-time.

Refined Management

Utilise DatAIM to promptly establish stream-lined, standardised, visualised and refined infrastructure operation and maintenance management system for every organisation.

Efficient Operation

DatAIM improves the infrastructure security and reliability, optimises the resource utlisa-tion rate, raise work efficiency and work load, reduce operation and maintenance cost.

BACKGROUND

As digital transformation continues to accelerate, network infrastructure has become even more crucial than ever for organisations. It forms the backbone of the digital economy. Which strategies can organisations employ to maximise the utilisation of their network cabling and assets while ensuring the reasonable expansion of their network infrastructure?

Key components of network infrastructure management

Geographical space

Environmental infrastructure

IT infrastructure

Cables and connections

Outdoor communications facilities

Virtual objects

Objects in office areas

Operation & maintenance management personnel

Problem 1:
Vast infrastructure comprising numerous equipment and cables

- Where is the equipment installed?
- What amount of free racks, ports and line space is available?
- Is the asset management information updated and accurate?

Problem 2 -
Complex line connection relations

- How are the cables connected?
- What routes are necessary to go through from the devices to the terminal?
- What is the scope impacted by line changes?

IMPACTS FROM NON-STANDARD NETWORK INFRASTRUCTURE MANAGEMENT

Potential risks

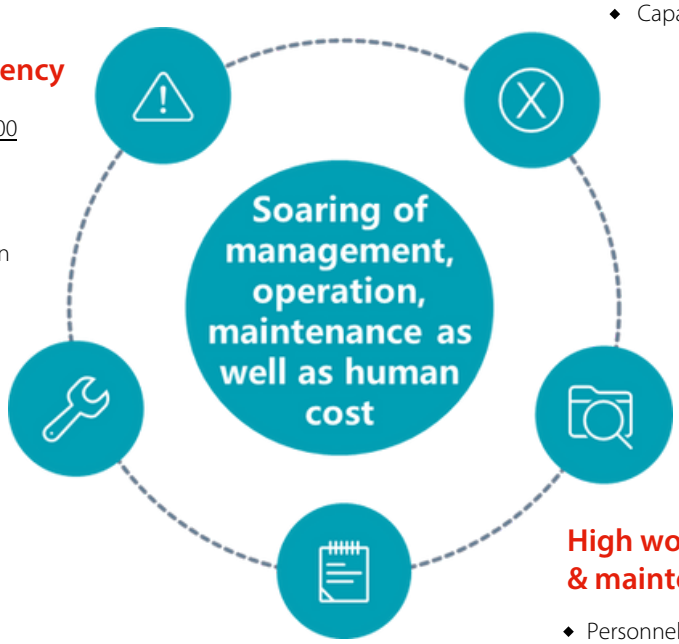
- Unable to efficiently monitor equipment and line changes and conduct operation behavior audit.
- Equipment is randomly connected and networks are used illegally.
- 80% of faults and security incidents are caused by the physical layer.

Resources cannot be utilised efficiently

- It is impossible to share equipment and line information.
- Resource utilisation level is low. Idleness ratio is >20%.
- Capacity expansion is lacking data basis.

Low troubleshooting efficiency

- 59% of the enterprises in Fortune 500 companies suffer downtime for over 1.6 hours weekly.
- The operation and maintenance personnel put in 39% of their time in fault management on average.



High workload for operation & maintenance personnel

- Personnel are occupied with emergency response and performing repetitive tasks throughout the day.

Lack of infrastructure operation and maintenance data

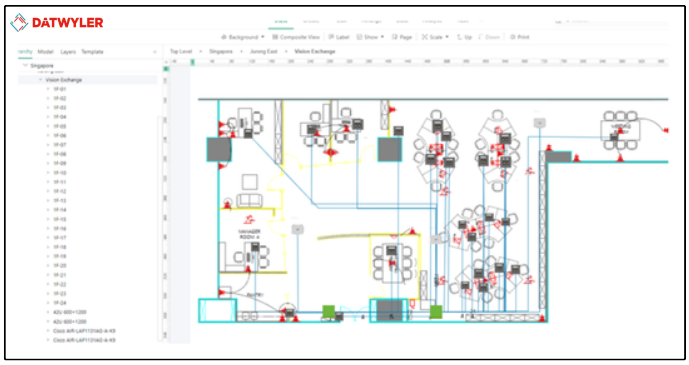
- Lack of operation and maintenance performance data.
- This makes it impossible to optimise processes.

Is there a way to **consolidate information** on network application management system, network equipment monitoring system, machine room environment, facility management system and network physical layer management – **depending on their specific implementation?**

INTELLIGENT DOCUMENTATION

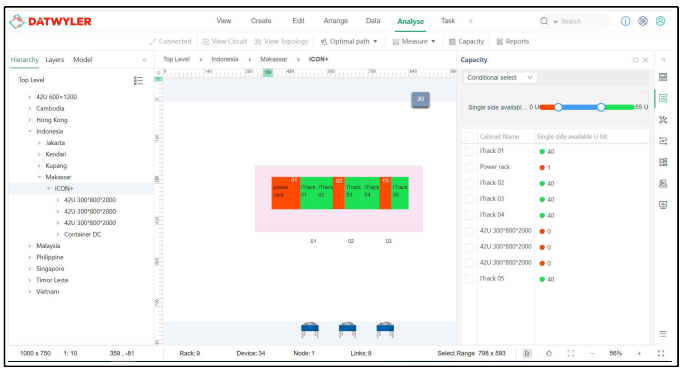
1. **Visual management** of comprehensive building wiring

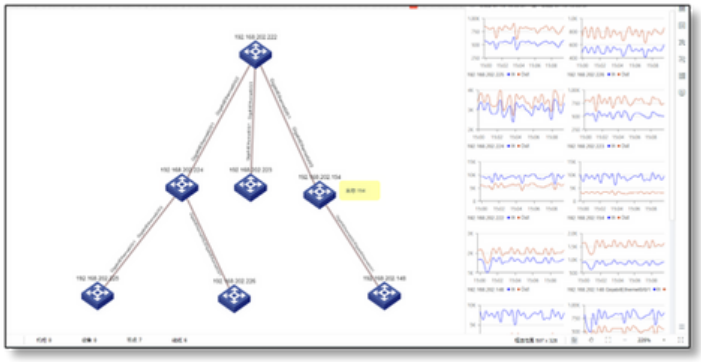
- Accurately record end-to-end connections between network equipment
- Manage telephone and network lines
- Manage network connection lines
- Manage floor distributors, switches, wireless APs and information panels
- Plan and manage spaces of machine rooms and racks
- Manage and recognise available network resources
- Manage cable tray availability
- View machine rooms and office area plan
- Easily and quickly locate network assets



2. Data centre network **infrastructure management**

- Manage and plan data centres using rack space, power consumption and physical layout space
- Provide asset and connection data supports for daily management and capacity expansion
- Manage user space in hosted data centers
- Manage asset life cycles in data centers
- Manage efficiency of daily changes in data centers





3. Automatic network **topology management**

- A hierarchical topology structure designed to facilitate the efficient management of large-scale networks
- Find Logical Link Control Protocol via topology and automatically generate a network topological graph
- Modify characteristics of etwork element entities, exhibit its contents
- Monitor and display devices, ports and link status in real-time
- Monitoring entity is defined by users
- Manage network elements via attachment and associate configuration files

CORE APPLICATION BENEFITS

Improving system security & reliability

- Operational behavior auditing and real-time monitoring improves the infrastructure security and reliability.
- Visual tracking improves link security capability.
- Resource and service mapping improves service assurance capability.

Improving work efficiency

- Intelligent planning and automatic work orders improve plan change efficiency.
- Physical-layer data analysis and operation and maintenance performance statistics improve troubleshooting efficiency.

Improving resource utilisation rate

- Resource and service mapping and capacity analysis improve resource utilisation rate.
- Visual resources to locate and recover idle resources.

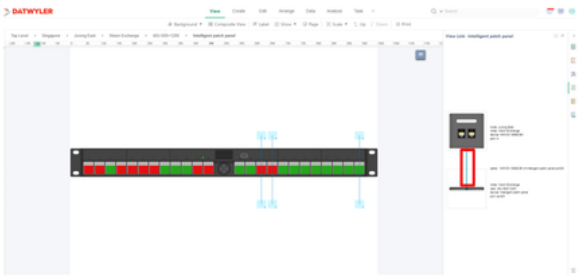
Reducing human efforts

- Visual on-line survey
- Intelligently aided planning, automated work order
- Automatic labeling
- Intelligent statistics and analysis

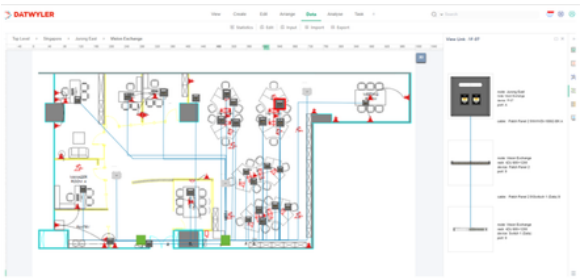
PLAN, DESIGN, QUERY & ANALYSIS

Query and locate equipment, boards, cards, lines and ports

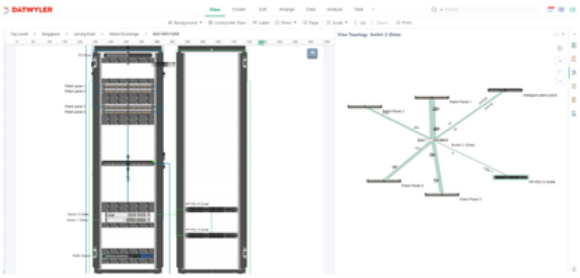
Link analysis - automatic generation of physical link



End-to-end connection - visual locating and query

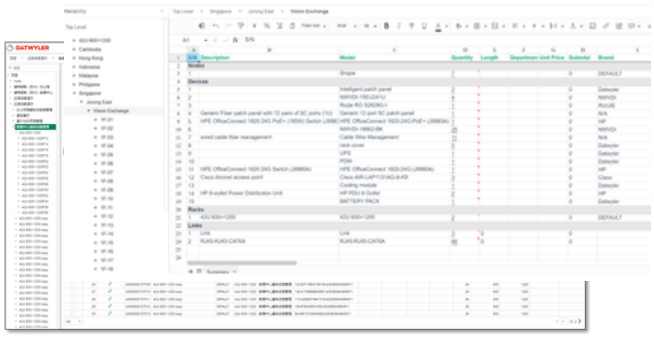


Topology analysis - automatic generation of physical topology

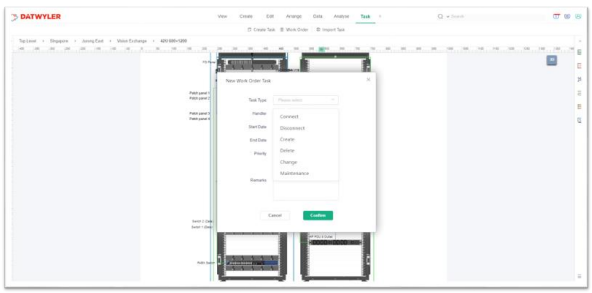


Analysis of machine room capacity

Providing a variety of dashboard and reports



Generate electronic work order



SUPPORT AND SERVICES

DatAIM is a comprehensive platform that adheres to open standards, offering dependable and user-friendly capabilities. Our in-house solutions team will share their expertise to support and assist with implementation.

Software upgrade and maintenance

- 5*9 remote technical support
- Active upgrade services
- Providing free models

Software implementation

- Setting up visual scenes
- Model Building Data
- Initialization System
- optimization and debugging

Software training

- Primary opereration training
- Certified engineer training
- Development certification training

Visual report custom services

- Visual report or dashboard designing & developing

Data collection services

- Rapidly and accurately collect cable and asset data using the template

Equipment and line organising services

- Standardised cable sorting
- Standardised cable and asset identification

System interface connection and integration

- Third-party system integration interface designing and developing

Customised function development services

- Customised function designing & developing

Complementary recommendations

Datwyler cables and components	Fibre optic & copper cabling solutions to suit all your needs. Contact Datwyler sales representative for more information.
Datwyler SMDC	State-of-the-art Smart Modular Data Centres, tailor-made and customised to fulfill different needs and requirements. Contact Datwyler sales representative for more information.
Datwyler SSP	Fully managed IoT platform designed to give organisations greater visibility and control over their critical IT and OT infrastructure worldwide. Contact Datwyler sales representative for more information.

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