

Cisco Meraki @ Telekom

Managed Services for Cisco Meraki and
shaping the future with APIs

Sourcing Advisors & Analysts Days 2023 //
Breakout Session 2023-06-29

Sebastian Ehrhardt



In Kooperation mit



Introduction



Sebastian Ehrhardt

IT Specialist / System Integration
Service operator in 1st level
System engineer in 2nd level

Main focus:










Cisco Meraki (Cisco Meraki Solution Specialist)
Cisco DevNet (CCNA DevNet)

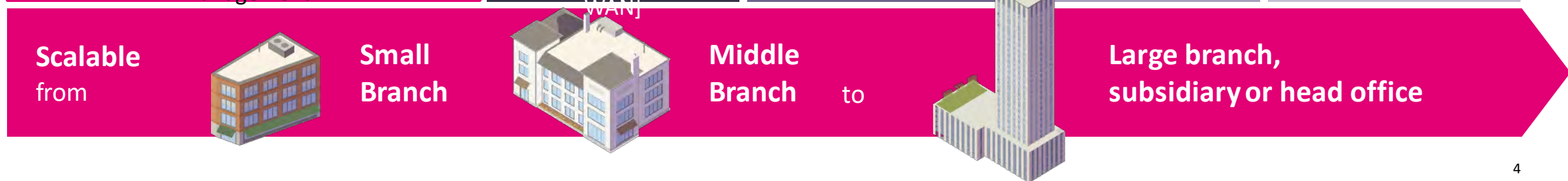


In Kooperation mit



Cisco Meraki – Portfolio

 <p>Dashboard Configuration & Management</p>	 <p>MR Wireless Access Points</p>	 <p>MS Ethernet Switches</p>	 <p>MX Security & SD-WAN Appliances</p>	 <p>MG Cellular Gateways</p>
	 <p>MI Insight [Application & WAN]</p>	 <p>SM Endpoint Management</p>	 <p>MV Smart Cameras</p>	 <p>MT Sensors</p>



Plan – Build – Run

Everything from a single source



Consulting and planning

- Development concept
- Sales Support
- Solution description
- Dimensioning
- Radio field illumination

Rollout and configuration

- Installing the components
- Dashboard configuration
- Project Management
- Documentation

Operation and service

- Full Managed Service
- Proactive network management
- Hardware Replacement
- Further development of the solution

Operation and service

- Proactive monitoring of the entire Meraki stack
- Analysis of the Meraki infrastructure, containment of faults and impairments
- Identifying potential for improvement
- Automation of regular tasks via API
- Contact person and competent support
- Support of the replacement process
- Change Management (Add, Move & Change)
- Firmware and license management

Competent and certified contact persons

Years of operational experience

Direct contact with the manufacturer



„Shaping the future with APIs“



In Kooperation mit



Shaping the future with the API

Innovation problem



- Most of the time in IT is spent on ongoing operations
- This leaves little room for innovation and further development

Solution: API



- saves costs
- makes IT more flexible
- allows faster development and more agile innovation
- sets no limits to creativity - nothing is impossible

APIs are the key to digitization



Success story: a fast-food chain



> 1.000 Restaurants
with 6,500 devices

- Fast food chain operating worldwide
- > 1,000 locations in Germany
- 2,500 Security & SD-WAN Appliances
- 4,000 switches
- Acceptance of the rollout, with an individually developed app

Cisco Meraki – Approval App



INSTALLATION WITHOUT APP

- Technician installs hardware
- Technician calls operations team
- Operating team checks function
- Technician documents installation



CHALLENGES

- Operating team is not available
- Technician has no possibilities to check
- Documentation is not uniform

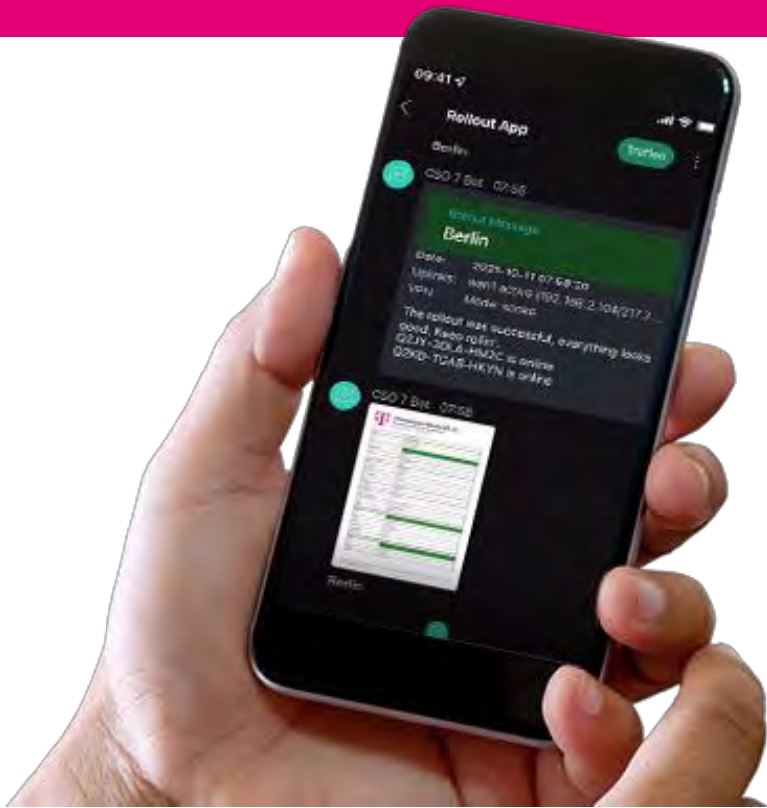


TARGET-SOLUTION

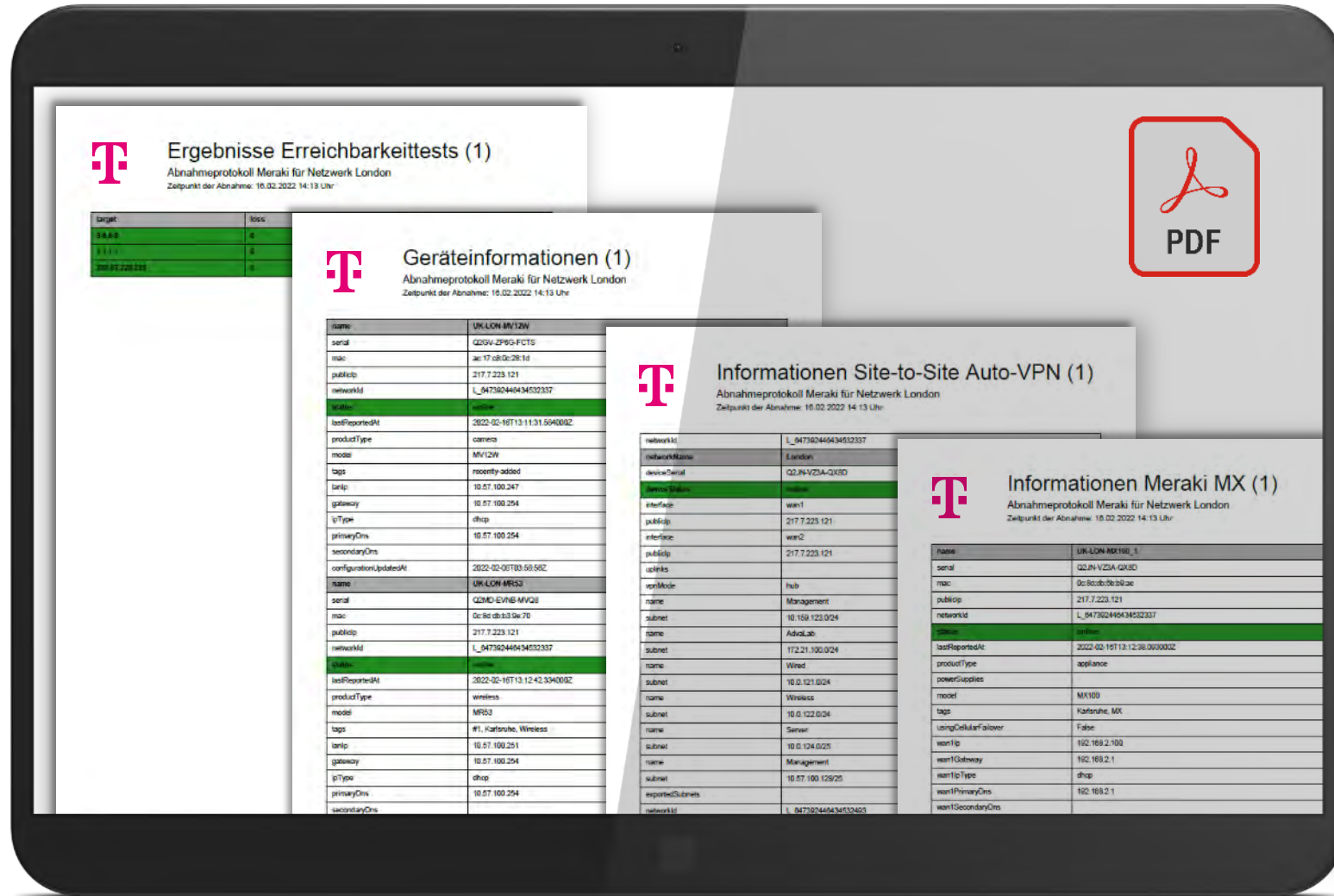
- More effective use of time
- Give technicians the opportunity to test on their own
- Higher quality
- Uniform documentation

Live Demo

Approval App



Documentation and Report



AUTOMATED

Check of the network through the app with traffic light status



QUALITY CHECK

Always guarantees high quality and prevents human errors



DOCUMENTATION

Information about the status as a PDF report

Approval App – and now?



Integration of the underlay

- Commissioning, testing and acceptance of the underlay
- Technicians have only one app



Barcode scanner

- Assignment of devices on site, with automated configuration in the background
- Replacement: scan defective device, scan new device - automated configuration.

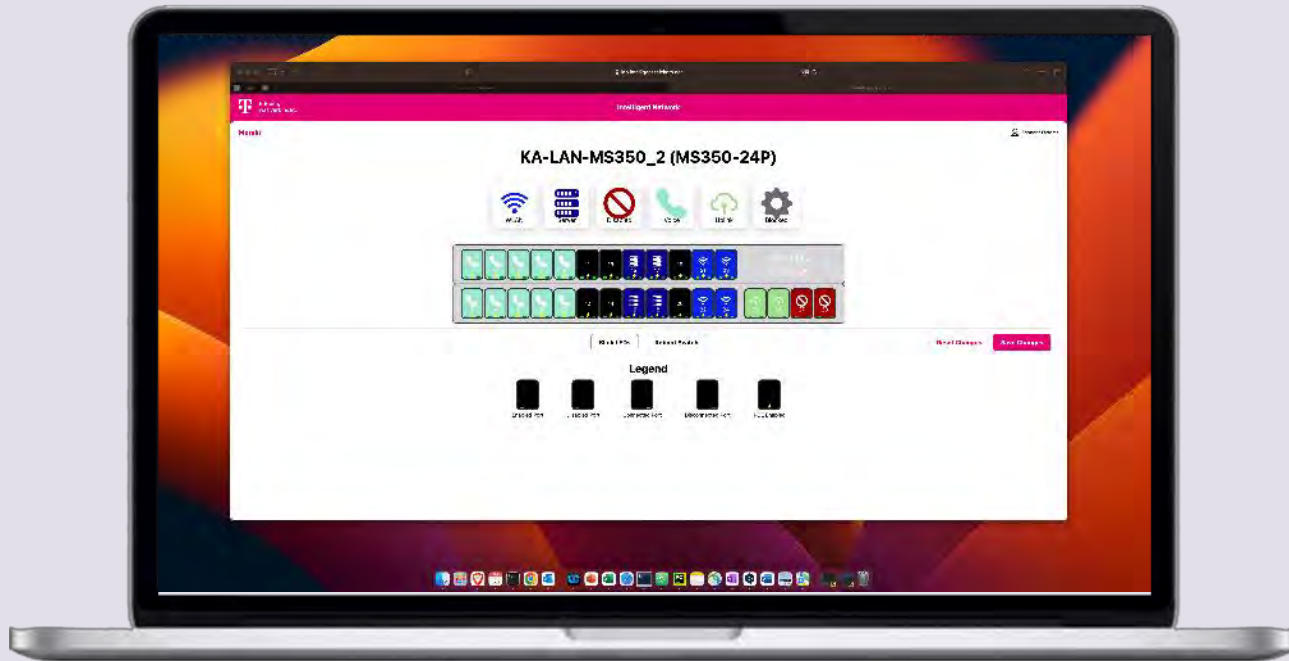


Customer requests and optimizations

- Speed, stability, scalability

Live Demo

Telekom Dashboard



Telekom Dashboard

Kundencenter

Home > Organization > DTA: Meraki Demo Lab > Karlsruhe-LAN > KA-LAN-MS350_2 > Switchport Editor

KA-LAN-MS350_2 (MS350-24P)

Voice Server Uplink Blocked Wireless

1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28

CISCO

Benachrichtigung...

Blink LEDs Reboot Switch Reset Changes Save Changes

Use Case: Energy saving through PoE analysis

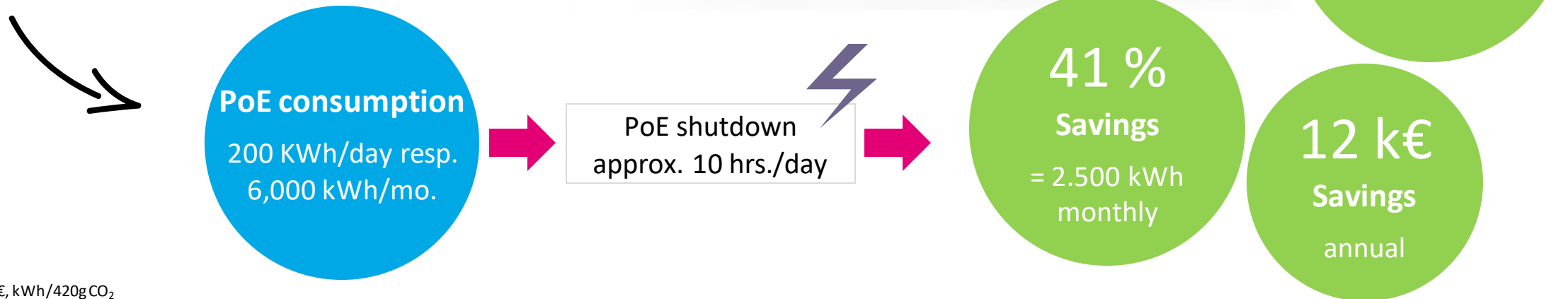
Systems such as telephones, access points, etc. are increasingly connected via PoE (Power over Ethernet).

Solution approach

- If systems are not needed at certain times, PoE ports can be switched off
- This saves power and CO2

Example calculation

The customer has installed 250 Meraki switches*.



* kWh/0,40€, kWh/420g CO₂



Use Case: Machine monitoring

"Predictive maintenance" can identify and report risky situations before the damage occurs.

Customer request

- Monitoring the power consumption of various machines
- Example saw for fish sticks: Increased power consumption indicates a blunt saw blade i.e.,
- if it cracks or breaks, the entire batch must be discarded and the production line comes to a standstill

Solution approach


- Customer already has a Meraki wireless infrastructure and thus gateways for IoT sensors
- Deviations are detected proactively
- Technician deployment is automatically planned



Use Cases: Examples from practice


Energy




Turn off PoE devices when not in use 

Building/Asset management




Monitoring of residence times via time recording 




Car and loading authorization or parking or loading authorization 




License plate recognition on Construction sites 

Security



Building/personal security through monitoring via sensors, cameras, ... 




Machine monitoring prevents damage 



Person recognition 



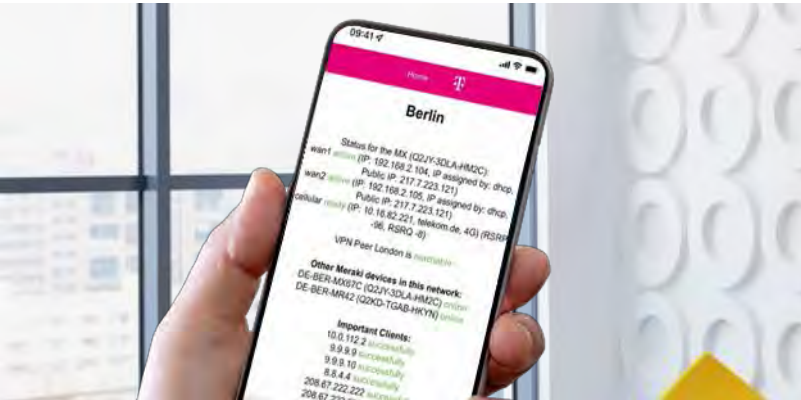
Damage prevention through temperature & air quality monitoring in the cold store 

Shaping the future with the API

Configuration and rollout of hundreds of sites in minutes

Rollout & Configuration Tool

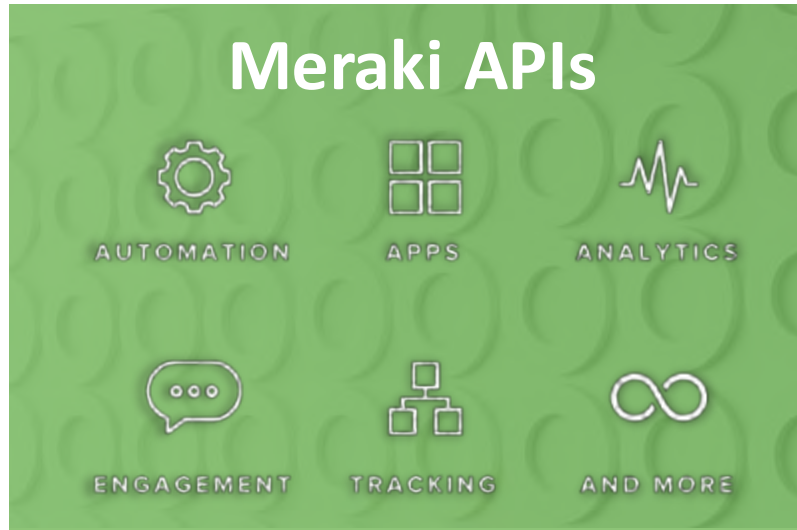
Independent installation and testing by technicians



Prototyping of tools within a few hours

High expertise in consulting and solution design

Meraki APIs

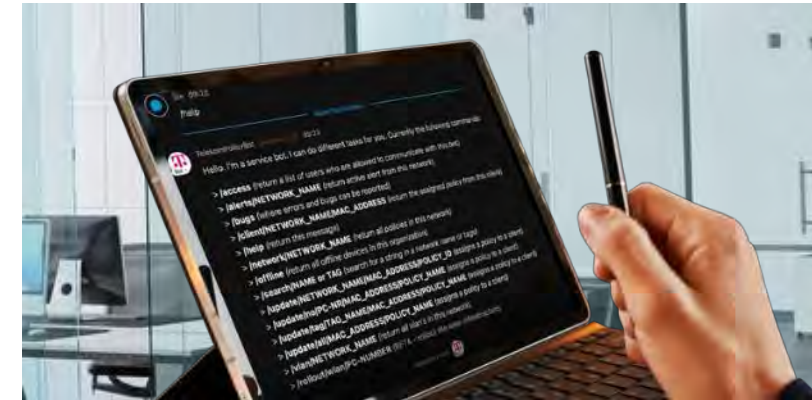


Flexibility and innovation in E2E operations

Makes life easier for our customers and enables rapid self-service changes

Webex-Bot for Changes

Customer changes configuration using a Webex Bot



Solve problems before they arise

Contact



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Thank you