

MOBILE FIRST HIGHER EDUCATION

June 2019

aruba

a Hewlett Packard
Enterprise company





Building the Campus for the **Experience Edge** **The Interaction of People, Places, and Things**

Uninterrupted experience

Optimized Gigabit connectivity for user, device, and environment

Automated and simplified IT operations



Higher Education Challenges

INSTITUTIONAL

Student Success
Attracting and Retaining Students
Perception of degree low ROI
Student security and safety
4-year Graduation Rate

IT AND APPLICATIONS

Network and Data Security
Data Analytics for Student Success
Accelerating Services
Adaptability, Scalability, Customization
Disparate IT Groups

Can You Afford Not
to Deliver **Stable Wi-Fi?**

dear barry university,
your wifi simply sucks.
Sincerely, a frustrated
college student trying
to study

I'm glad I denied a
University
IT job offer - these guys
can't even get wifi
working right on most of
the campus.

Student Success Requires an Informed, Reliable and Smart Network

#GenMobile Undergraduate Student Statistics

85%

want a tech savvy
university⁴

25%

want data-driven
personalization for
academic
success⁴

81%

connect two+
devices
simultaneously⁵



BYOD



Connectedness



Capacity



The Higher Education Solution

Unmatched network assurance

Easy automation, control, integration

Faster detection, diagnosis, and resolution

Immediate visibility into what's happening

Infrastructure



Campus AP



Access



Remote AP



Beacons



Core / Agg



Controllers

Management



AirWave



NetInsight



Mobility Master

Security

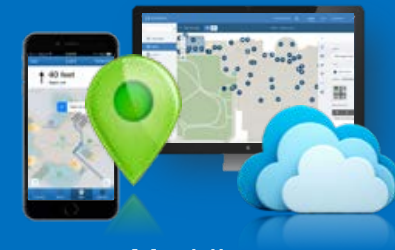


ClearPass



IntroSpect

Applications



Meridian

zoom Skype for Business

tesm Robin

Envoy Space IQ

skyfijio Microsoft Azure IoT Platform Patrocinium™

CBRE HermanMiller

Partnerships

Aruba Connection to **Always On Connectivity**

Students say connectivity issues are the **#1 impact** on academic success¹

Uninterrupted high bandwidth connectivity while roaming or in dense environments

Built in intelligence to prioritize learning apps

ClientMatch | AirMatch | AppRF | Smart Rate



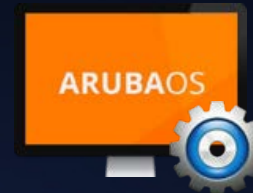
Access



Campus AP



Controllers



Mobility Master

Know about issues before students
Optimize poor performing buildings
Use network data to support campus initiatives

Machine Learning | Network Analytics



NetInsight



Core/Agg

Empower students with self-serve features

Proactive discovery of RF/non-RF issues

Personalize student experience and enable smart classrooms

3rd Party Integration | Multi-Vendor Insights | Location Aware Intelligence



AirWave



ClearPass



Partnerships



Meridian



Beacons

Architected for Capacity and Uptime



ClearPass
AppRF™

Device use and proliferation

12M
authentications per
day

↑ Network demands
as wearables and
IoT increase⁴

Proven scalability

100K+
unique clients
per day⁶

40TB
data transferred
per day⁶

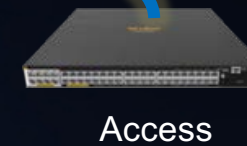
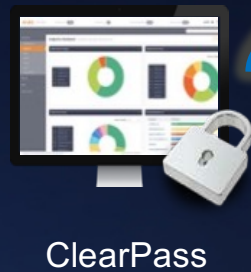
Aruba Connection to Security

#1 Higher Education IT Issue for 2018 is Information Security²

User-level awareness of all traffic
(Device types and app flows)

Differentiated access for student, staff, guests, and IoT

Automatically segment traffic to the correct location
(Academic – Facilities – Public)



Machine learned analytics to respond to risk



Deployment Flexibility for All Locations

Satellite Campus

Satellite Campus Wi-Fi
with built-in controller



Main Campus

Controller-based
centralized encryption with
advanced services at scale



Remote Staff

Virtual Intranet Agent
and Remote APs



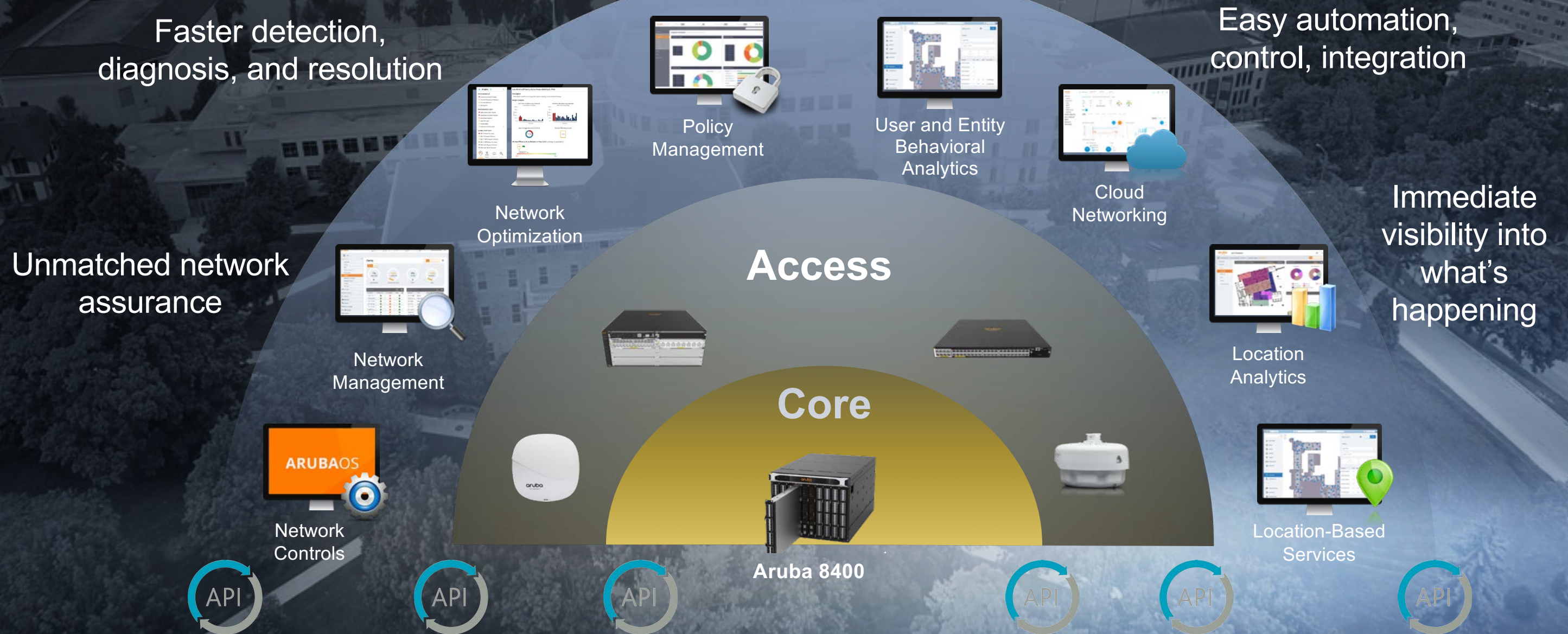
Students roam with consistent user experience

Right-size infrastructure for environment and budget

Reduce IT workload with simple and consistent management tools

Pulling it all together

Mobile First Architecture



Aruba Mobile First **Ecosystem**

Best in Class Community

Aruba Ecosystem

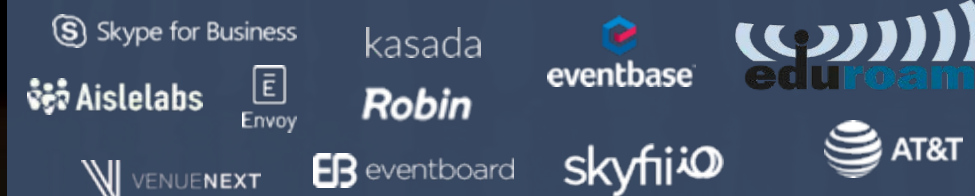
IT SERVICES



Technology
Partners

GTM
Partners

BUSINESS AND USER FACING APPLICATIONS



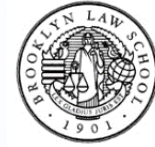
Alliances

Airheads and
Developers

Partnering Across IT, Security, Apps, Business Solutions, and Services



Yale University



Improve Wi-Fi Security, Coverage and Performance

Aruba Solutions: Aruba 801.11ac APs, 7200 Series Mobility Controllers, 5400R Switch Series, ClearPass Policy Management, and AirWave Network Management



- Improved Wi-Fi security and coverage
- 50% Wi-Fi performance increase
- Poor coverage library complaints reduced from dozens per month to zero
- Enables future technologies leveraging built in Bluetooth beacons
- Streamlined operations via HPE core, edge, and Wi-Fi solutions



Superior Performance

Aruba .11ac Wi-Fi, ClientMatch: Complete campus-wide .11ac infrastructure maximizing devices/AP matching

AirWave: End-to-end management (23 buildings + outdoor)

One of the top 20 comprehensive universities in the U.S.

“With the Aruba 802.11ac infrastructure, we can see a direct link between the performance and ability to support teaching and learning.”

Peter Quan, Vice President and Chief Technology Officer



Innovative Classroom Instruction

Aruba .11ac Wi-Fi, AppRF: Real-time proctored testing

ClearPass: Advance policy services for tablet app based learning

“A robust Wi-Fi network enables classroom innovations (app-based learning, shared communications, on-the-fly presentations, quizzing and testing) for improving student learning.”

Bret Wood, Professor