



**BROCADE**

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# **THE INTERNET IN TRANSITION: MIGRATING TO IPv6 WITH BROCADE**

# THE INTERNET OF EVERYTHING

## A Proliferation of New Clients and Devices



# IPv4 EXHAUSTION CREATES NEW BUSINESS OPPORTUNITIES

- Client systems will migrate to IPv6
- Enterprises can differentiate by delivering content and services to IPv6 subscribers
- Service Providers can differentiate by creating new IPv6 migration services

# BROCADE IPv6 STRATEGIC BLUEPRINT

Service availability to both  
populations of users

IPv4 to  
Dual Stack

# BROCADE IPv6 STRATEGIC BLUEPRINT

NEAR-TERM

Offer content to  
IPv6-only clients

IPv6  
Presence

Enabling access to  
protocol “islands”

IPv4/IPv6  
Inter-Operability

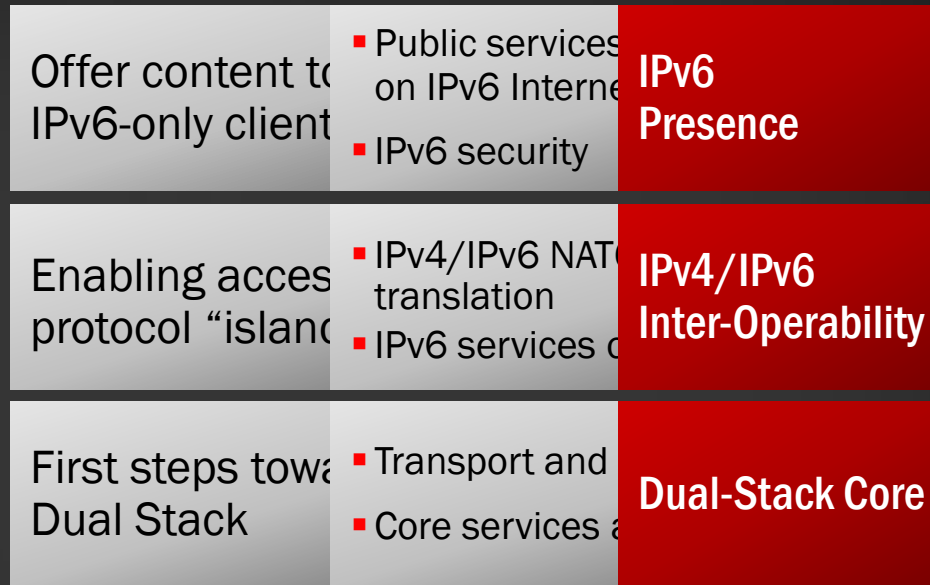
First steps toward  
Dual Stack

Dual-Stack Core

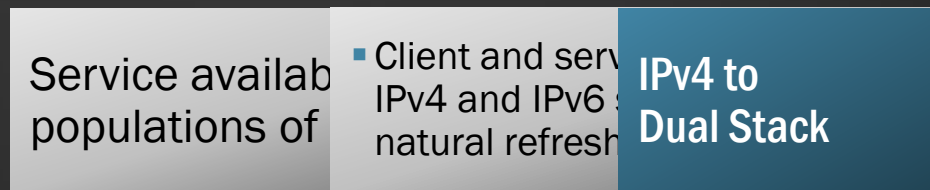
LONG-TERM

# BROCADE IPv6 STRATEGIC BLUEPRINT

NEAR-TERM



LONG-TERM



# BROCADE ADX FAMILY: TOOLS FOR MIGRATION



NEAR-TERM

## IPv6 Presence

- Public services and content on IPv6 Internet
- IPv6 security

## IPv4/IPv6 Inter-Operability

- IPv4/IPv6 NAT64 protocol translation

## Dual-Stack Core

- Transport and visibility
- Core services and backbones

LONG-TERM

## IPv4 to Dual Stack

- Client and server migration to IPv4 and IPv6 services on natural refresh cycles

# BROCADE MLX FAMILY: TOOLS FOR MIGRATION



NEAR-TERM

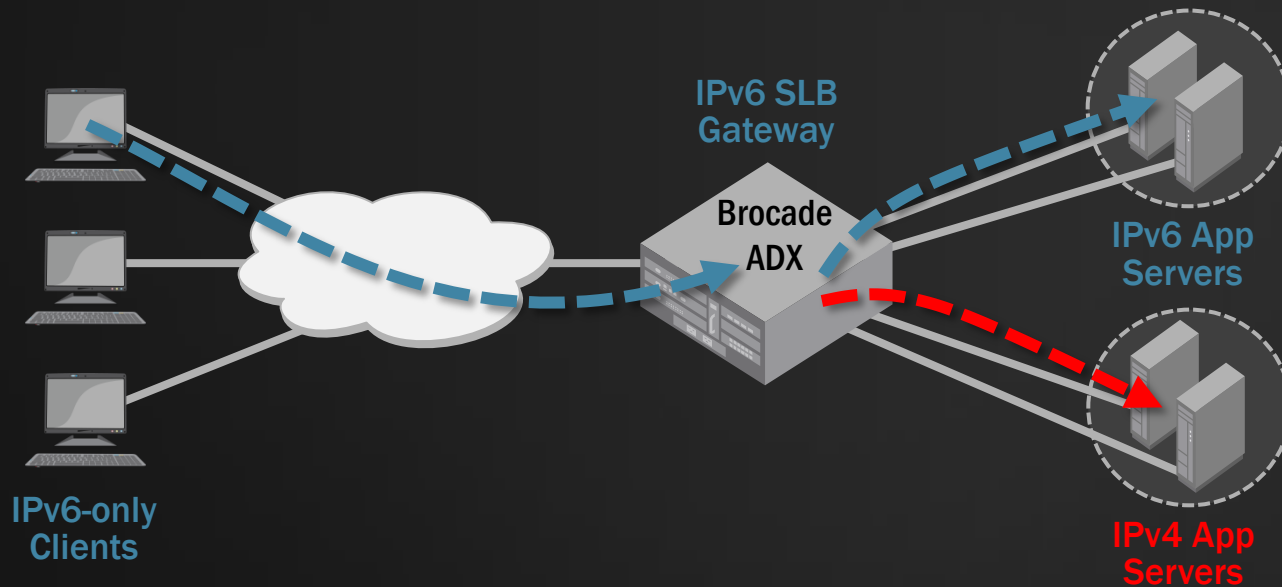
IPv6 Presence	<ul style="list-style-type: none"><li>Public services and content on IPv6 Internet</li><li>IPv6 security</li></ul>
IPv4/IPv6 Inter-Operability	<ul style="list-style-type: none"><li>IPv6 services over MPLS</li></ul>
Dual-Stack Core	<ul style="list-style-type: none"><li>Transport and visibility</li><li>Core services and backbones</li></ul>

LONG-TERM

IPv4 to Dual Stack	<ul style="list-style-type: none"><li>Client and server migration to IPv4 and IPv6 services on natural refresh cycles</li></ul>
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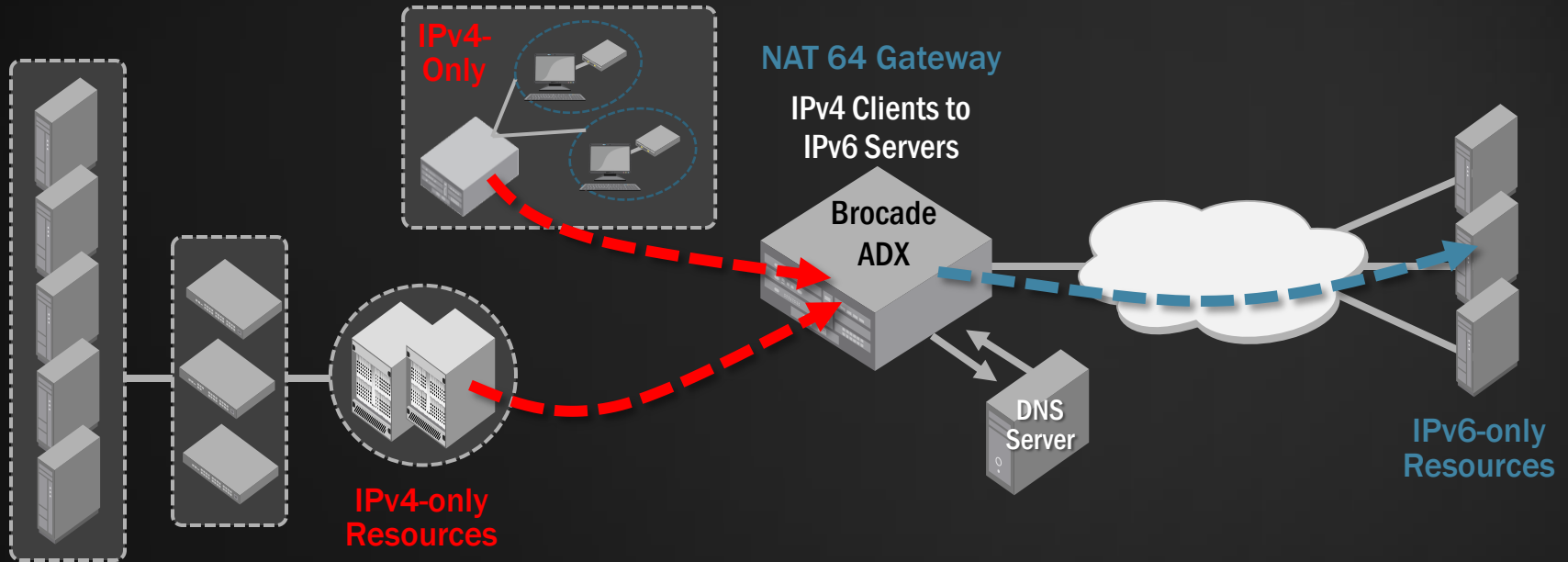
# IPv6 Presence Use Case: Brocade IT

**DELIVERING SERVICES TO IPv6 CLIENTS WITH EXISTING INFRASTRUCTURE**



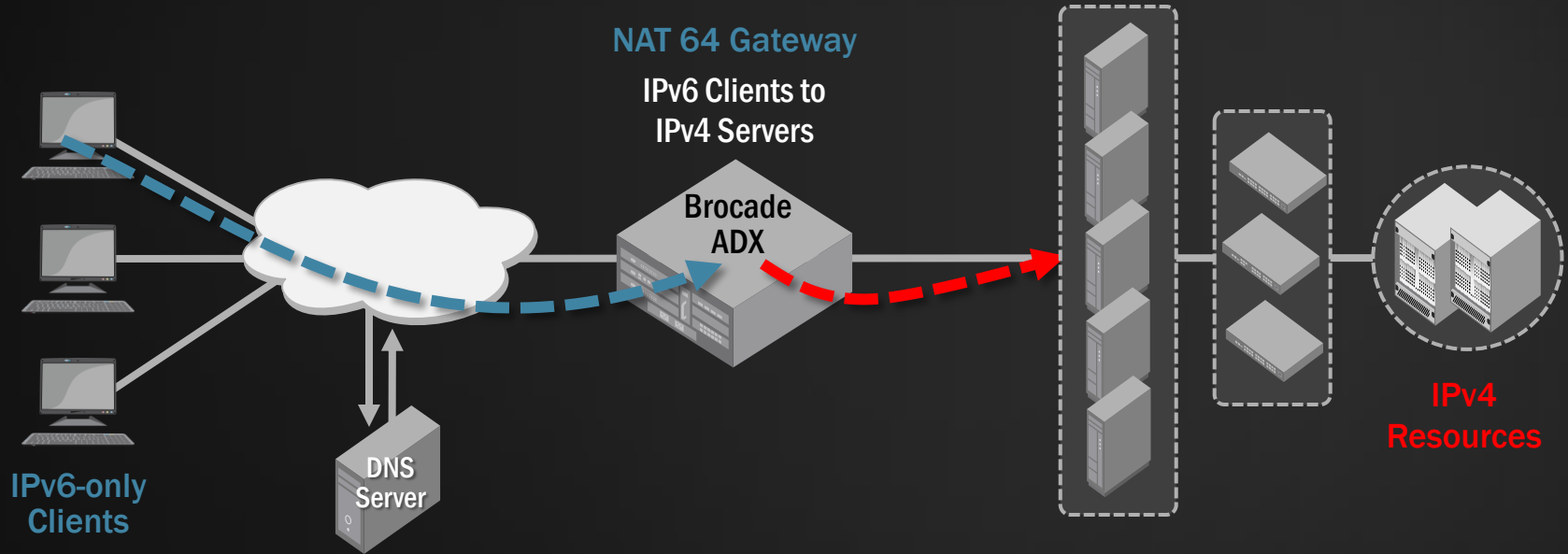
# IPv4/IPv6 Inter-Operability Use Case: Cable Provider

## CONNECTING LEGACY IPv4-ONLY CLIENTS TO NEW IPv6 RESOURCES



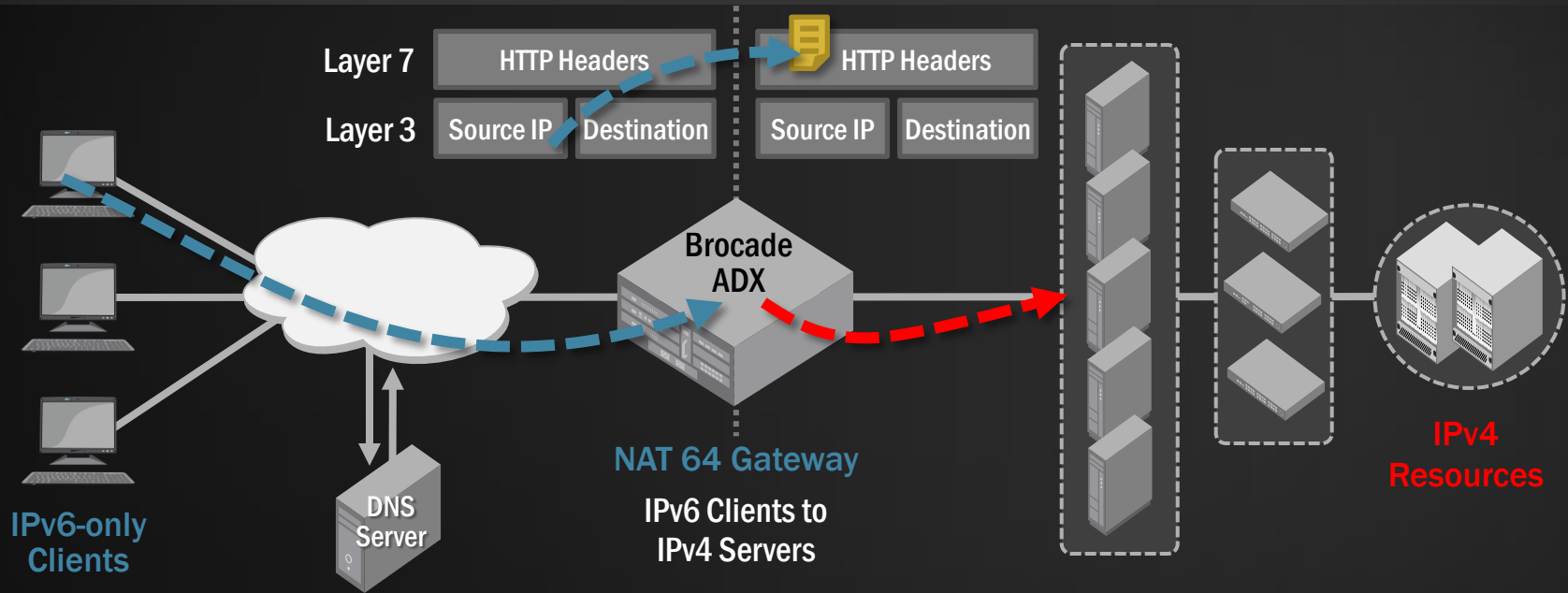
# IPv4/IPv6 Inter-Operability Use Case: Hosting Provider

**ENABLING NEW IPv6-ONLY CLIENTS ACCESS TO EXISTING IPv4 SERVICES**



# Inter-Operability is an Application Layer Problem

**ROUTER-BASED IMPLEMENTATIONS LACK APPLICATION INTELLIGENCE**



# BROCADE APPLICATION DELIVERY SWITCHES

- Highest levels of scalability
- Ultra-low latency
- Highest resiliency
- Broad orchestration support



- Demand IPv6 dual stack support in all your product choices
- Look for opportunities to get started – simple projects that have real ROI
- Brocade Routers and Application Delivery Switches are purpose built for IPv6 migration