INVESTOR MEETING 2014

Diane Bryant

Senior Vice President & General Manager
Data Center Group

Key Messages

Big industry trends fuel data center growth

Investing to win across workloads & segments

Revenue CAGR at 15% through 2018*

*Forecast is based on current expectations and is subject to change without notice
Source: Intel

Capitalizing on Industry Trends

Move to Digital Service Economy

Billions of connected **DEVICES**

Build out of the **CLOUD**

New **SERVICES**

Jevons Paradox

Increase in **technology efficiency**

Increases rate of **consumption**

Leads to **new usages**

Resulting in Four Data Center Growth Drivers

Cloud

NFV / SDN

HPC

Big Data

2013

… and Drive Unprecedented Economic Results

China's "Singles' Day" (11/11) = 3X US Cyber Monday Sales

Alibaba.com
阿里巴巴

$5.7 BILLION IN SALES

&

188M TRANSACTIONS

in One Day

Source: Alibaba, November 2013

2014

China's Singles' Day 2014
11/11

Alibaba.com
阿里巴巴

63% INCREASE VS. 2013

$9.3 BILLION IN SALES

&

85% INCREASE VS. 2013

278M TRANSACTIONS

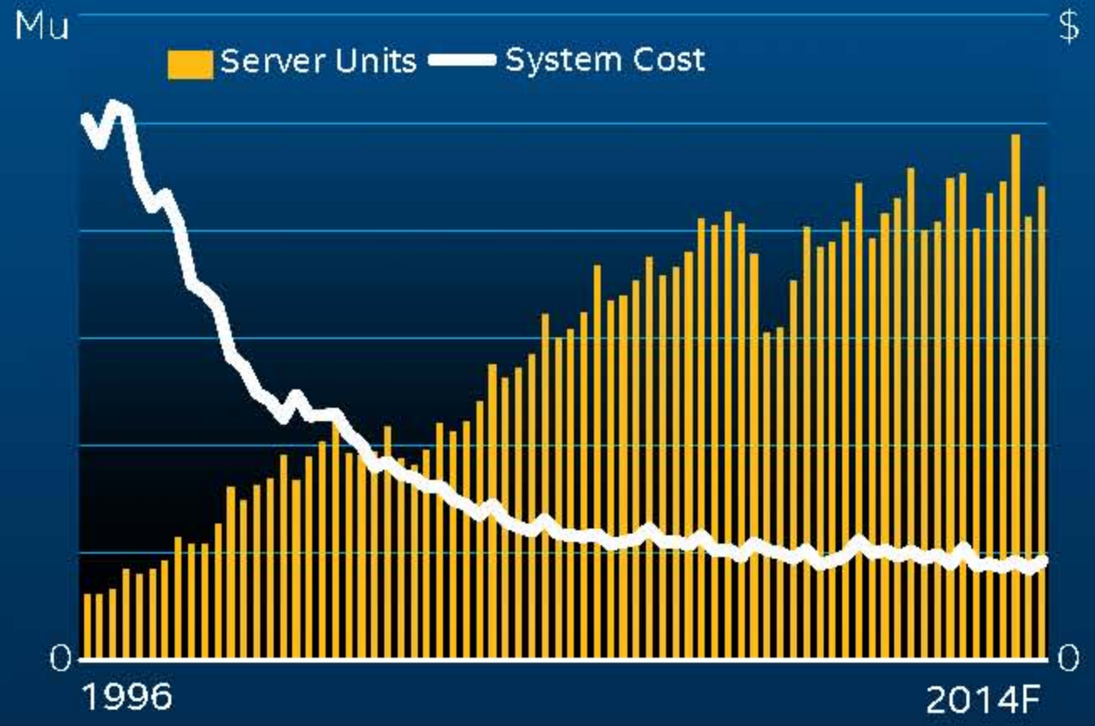
in One Day

43% of transactions from mobile devices

Source: Alibaba, November 2014

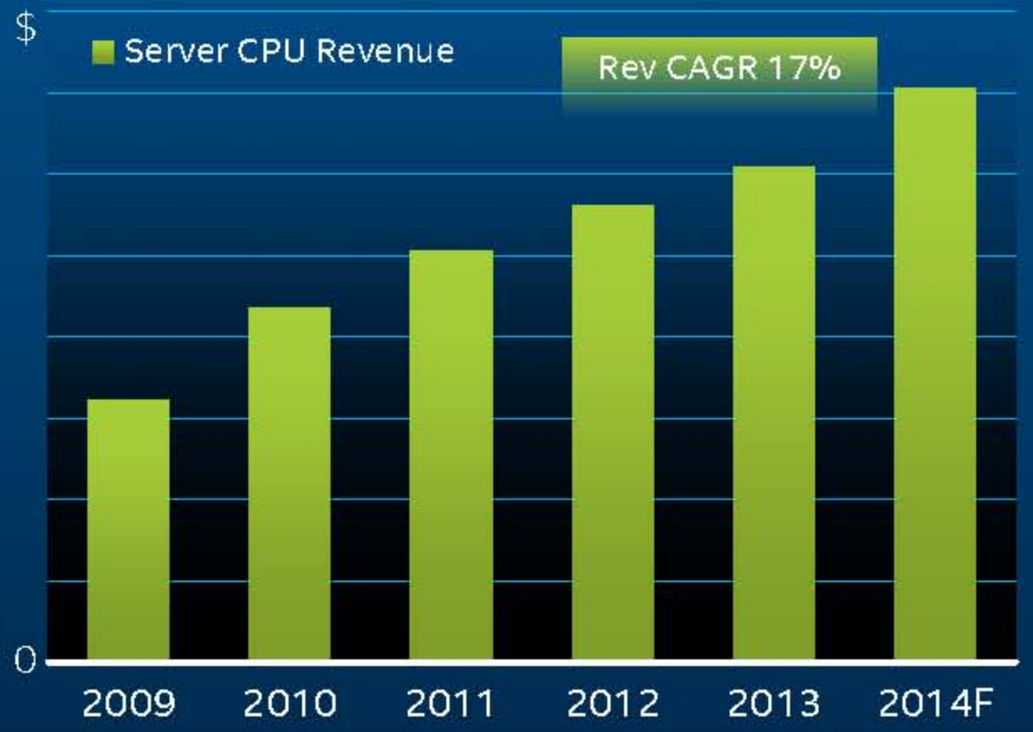
Jevons Paradox

Impact of high volume x86 servers
1996-2014



SHV servers delivered **80%** system cost savings over RISC & drove **625%** increase in volume

Move to virtualization fuels growth
Revenue 2009-2014



5X improvement in server utilization results in **17%** revenue CAGR

Next efficiency transformation

Cloud Architecture & NFV / SDN

Data Center Transformation

Enterprise IT

In 2014, **12%** of Enterprise IT deploying private cloud

UBS
NFV/SDN connecting a Hadoop cluster for banking operations

Cloud Service Provider

Tencent
Deployed NFV / SDN for Cloud network

AWS
Deployed 729 TFLOP HPC cluster, 71K cores in 60 min

Telco Service Provider

China Telecom + VMware
Delivering hybrid cloud, IaaS

China Mobile
Big Data solution for billing inquiry service

Technical Computing

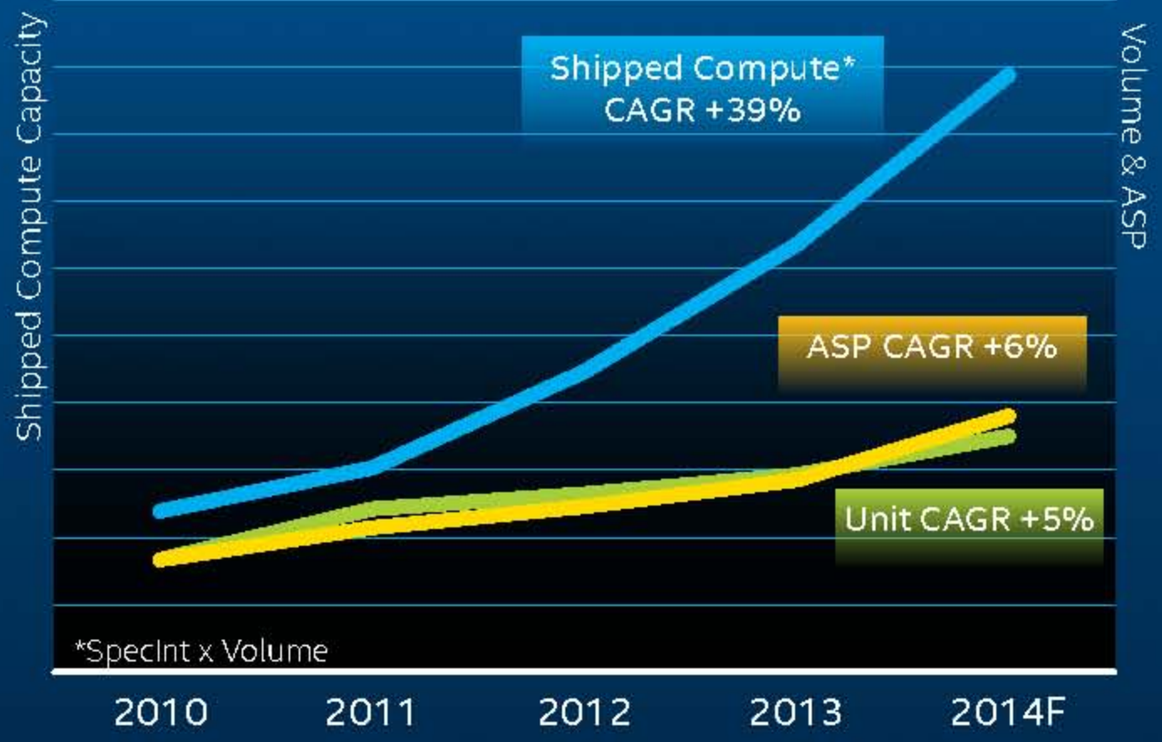
Paypal
Semantic analysis using HPC for detecting anomalous transactions

Growth Drivers Underlie All Segments	Cloud	NFV / SDN	HPC	Big Data

Sources: RightScale 2014 State of the Cloud Report, Amazon

Compute Capacity Drives Purchase Decision

Analyzing DCG Growth



2 Socket Xeon Processor Mix

Increased capacity per system drives up processor mix

70% of volume moves up over 4 years

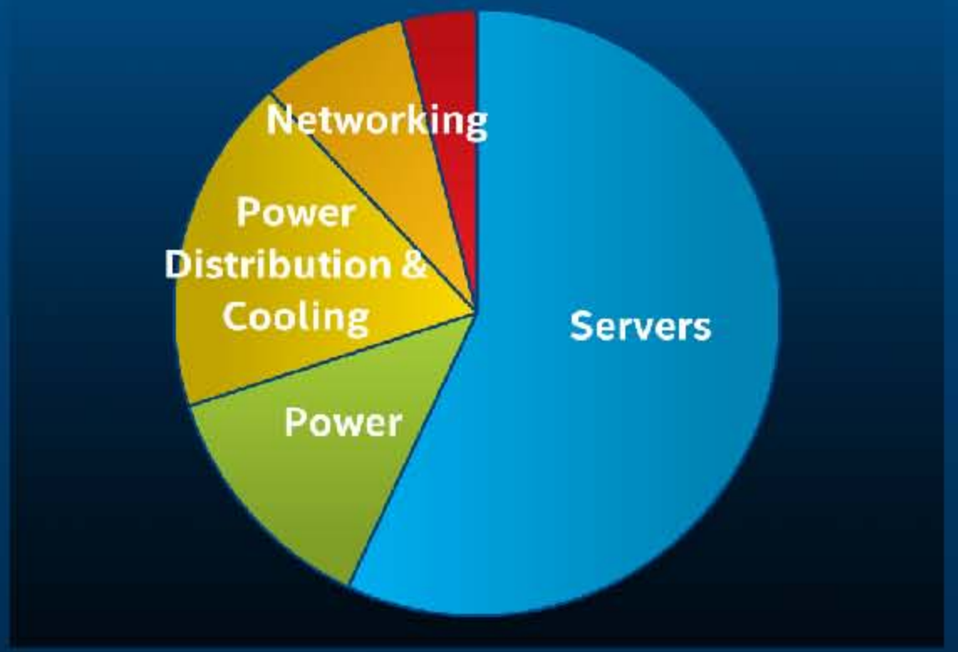
Compute Capacity Drives End-user Value

Enterprise IT TCO

Cost / Bandwidth	Server A	Server B
CPU	Haswell, **10 cores**	Haswell, **6 cores**
RAM	256GB	256GB
Avg. System Cost	$10,519	$7,519
# of Servers	10	19
4-year TCO	**$543,932**	**$977,672**

SKU selection provides
Up to 44% TCO savings over 4 years

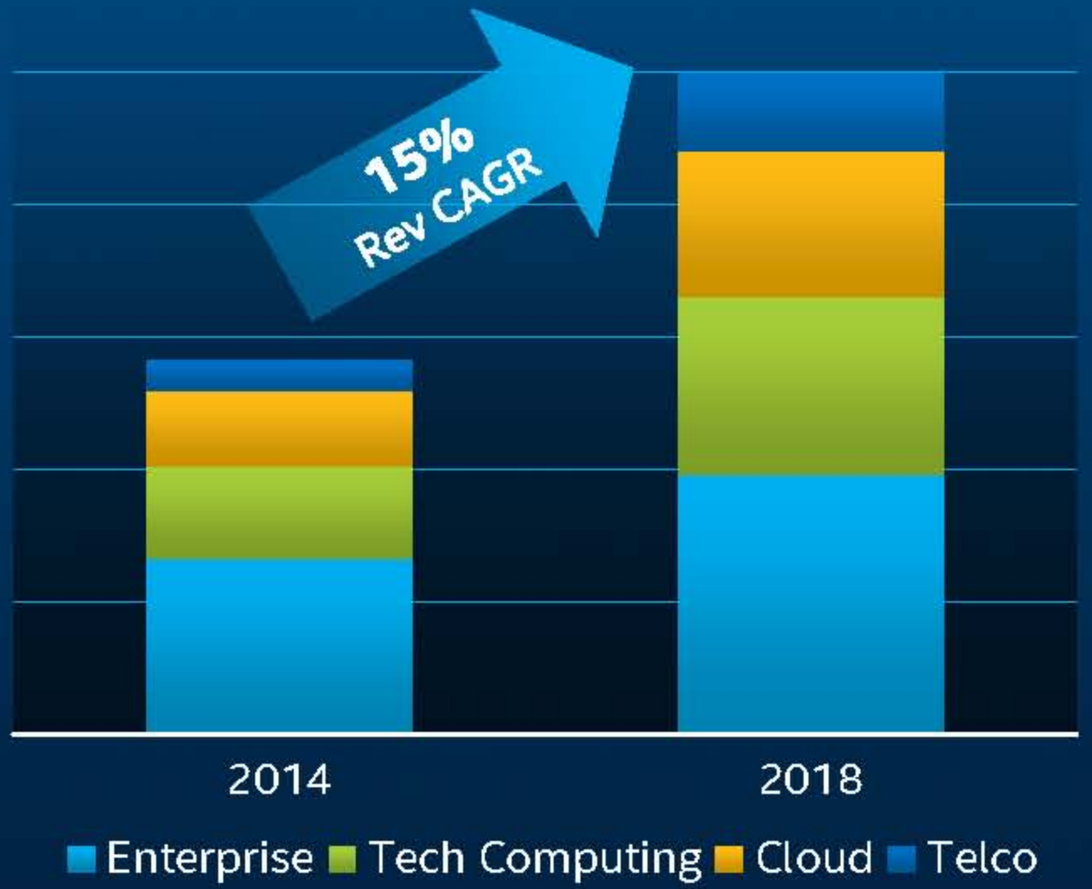
Amazon's TCO Analysis



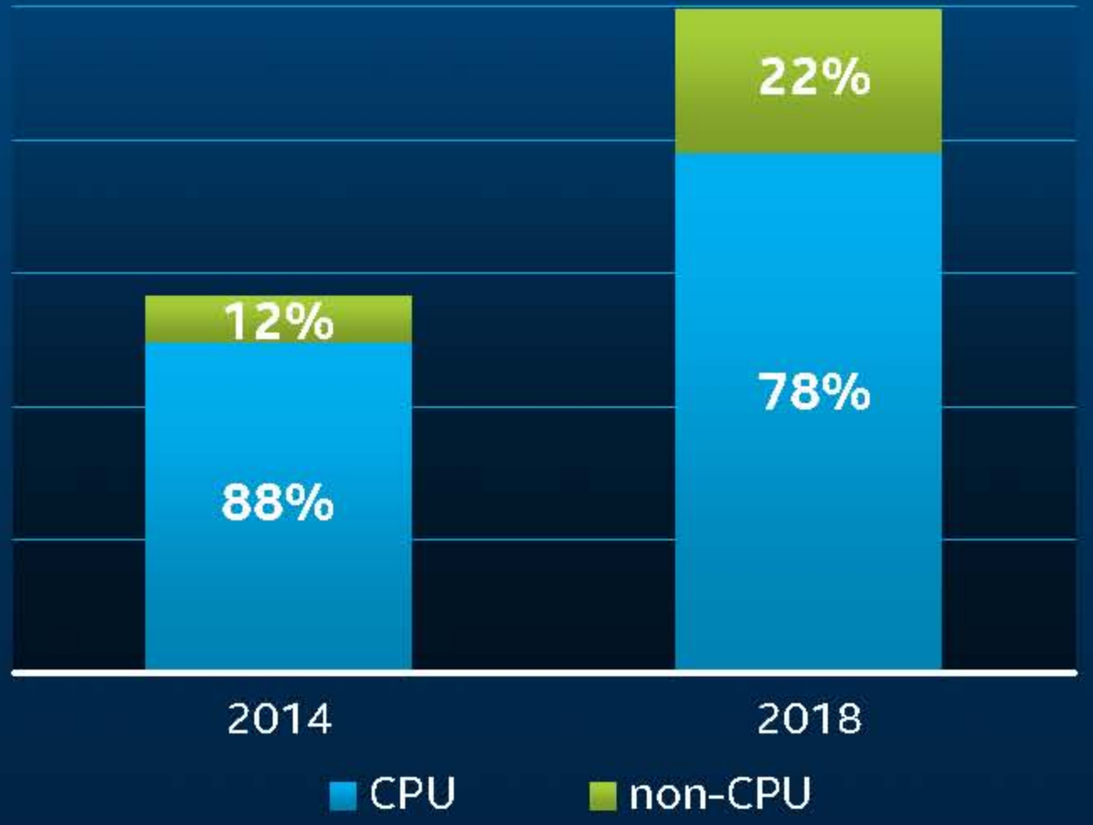
Customized SKU provides
Up to 14% more performance for 2-4% incremental TCO

Data Center Growth Forecast

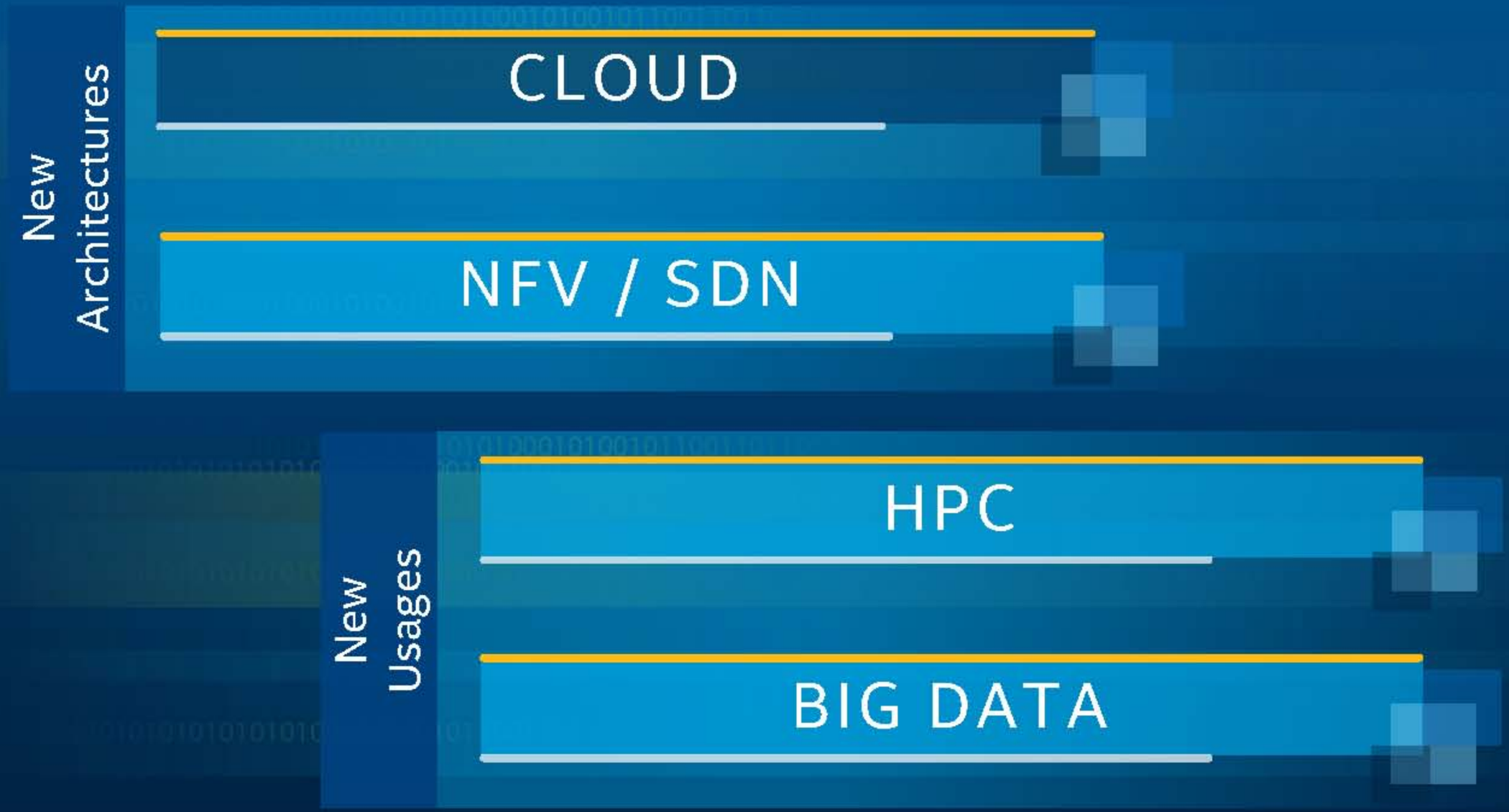
Data Center Revenue Forecast



Data Center Portfolio Diversifying



Four Growth Drivers



Jevons Paradox: Cloud Architecture

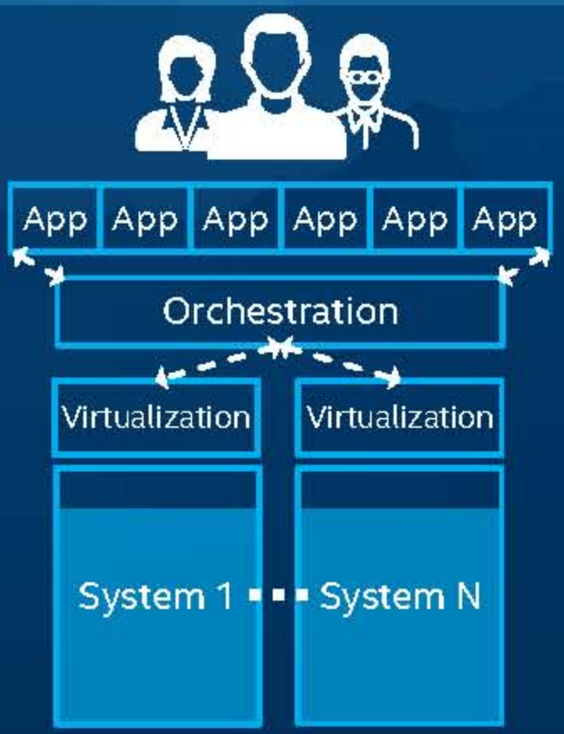
Increased efficiency through the Cloud

- Revenue Acceleration: Easier to create new apps and services
- OpEx Efficiency: Automation of the data center
- CapEx Efficiency: Maximize use of system resources

Traditional

Virtualized

1. Shared resources



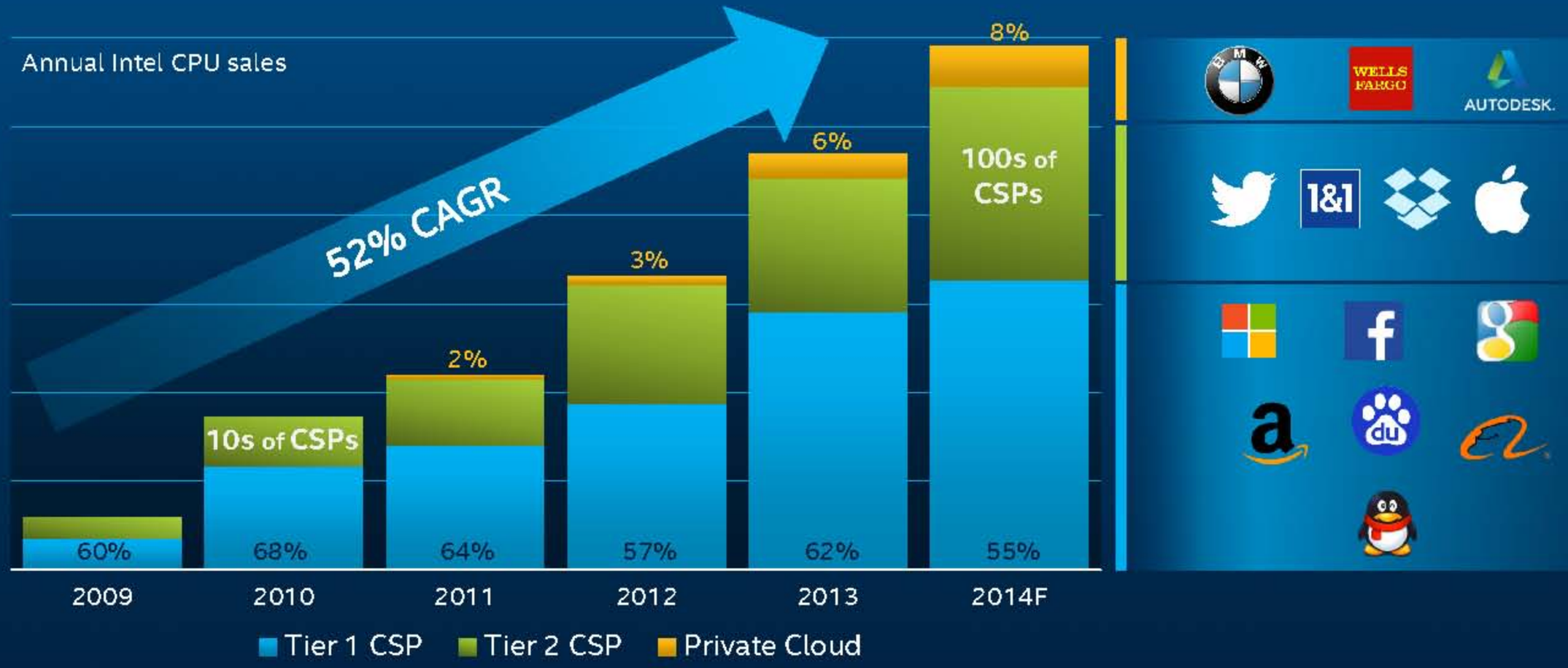
Cloud

1. Self-service
2. Automation
3. Multi-tenant
4. Measured services

= Resource Utilization

Cloud Computing Growth

Connected Devices + Apps + New Services + New Service Providers



Forecast is subject to change without notice

Public Cloud SPs: Exposing Intel Value

IBM Soft Layer

AWS EC2

Instance Types Matrix

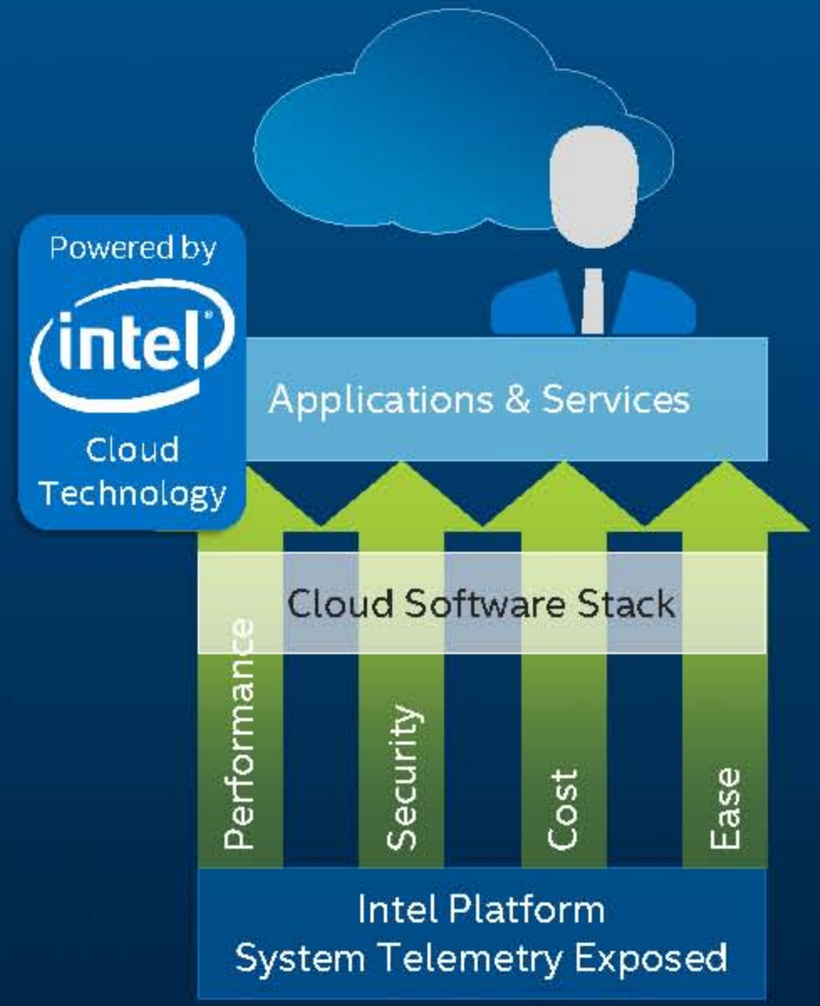
Instance Type	vCPU	Memory (GiB)	Storage (GB)	Networking Performance	Physical Processor	Clock Speed (GHz)	Intel® AES-NI	Intel® AVX†	Intel® Turbo	EBS Opt	Enhanced Networking
t2.micro	1	1	EBS Only	Low to Moderate	Intel Xeon family	2.5	Yes	Yes	Yes	-	-

69%
'09-'14 Revenue CAGR

10% increase in MSS to **94%** '09-'14

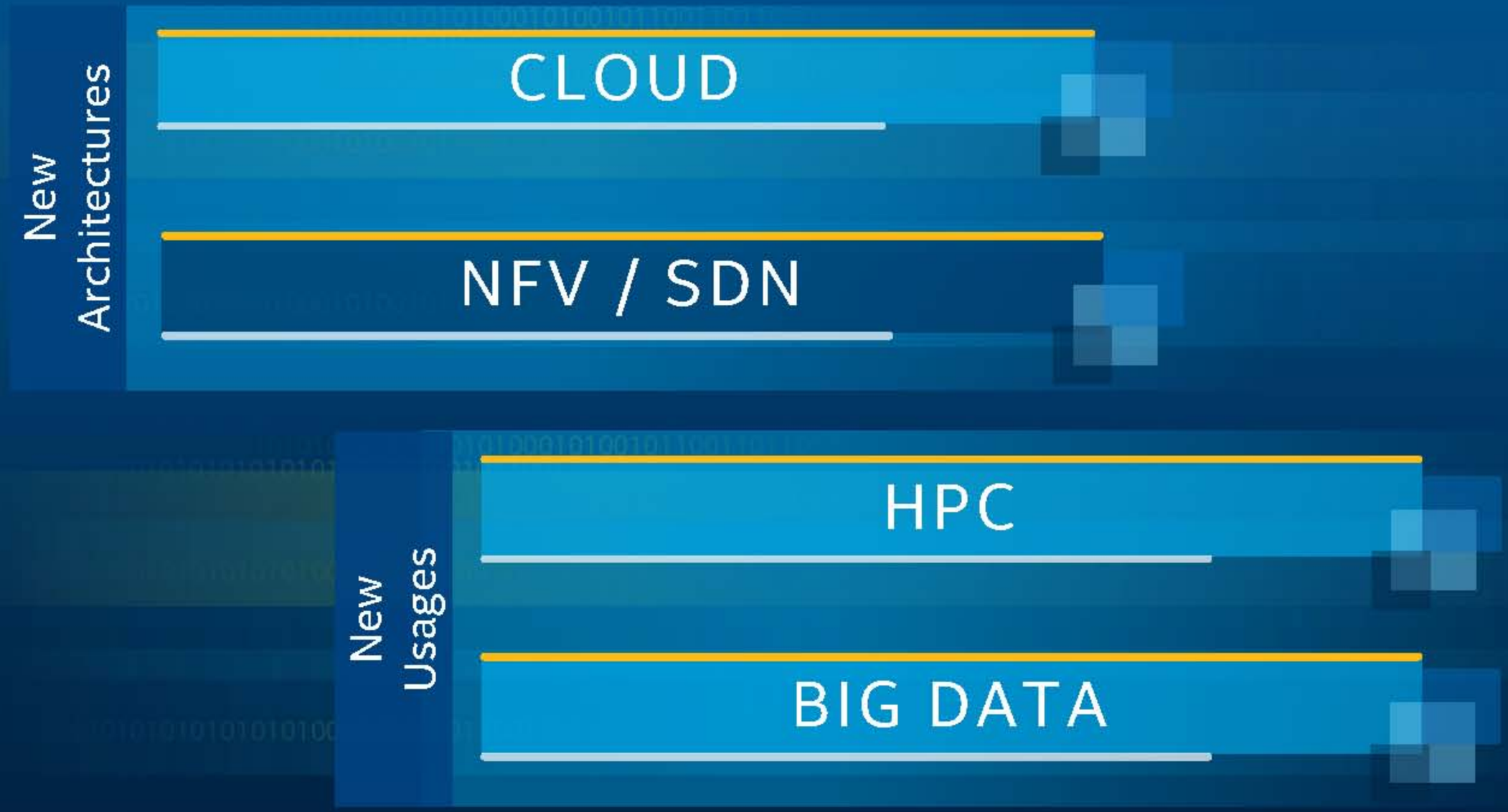
amazon web services · CenturyLink · rackspace · virtustream · SOFTLAYER

45 Cloud Service Providers branding Intel Inside cloud services

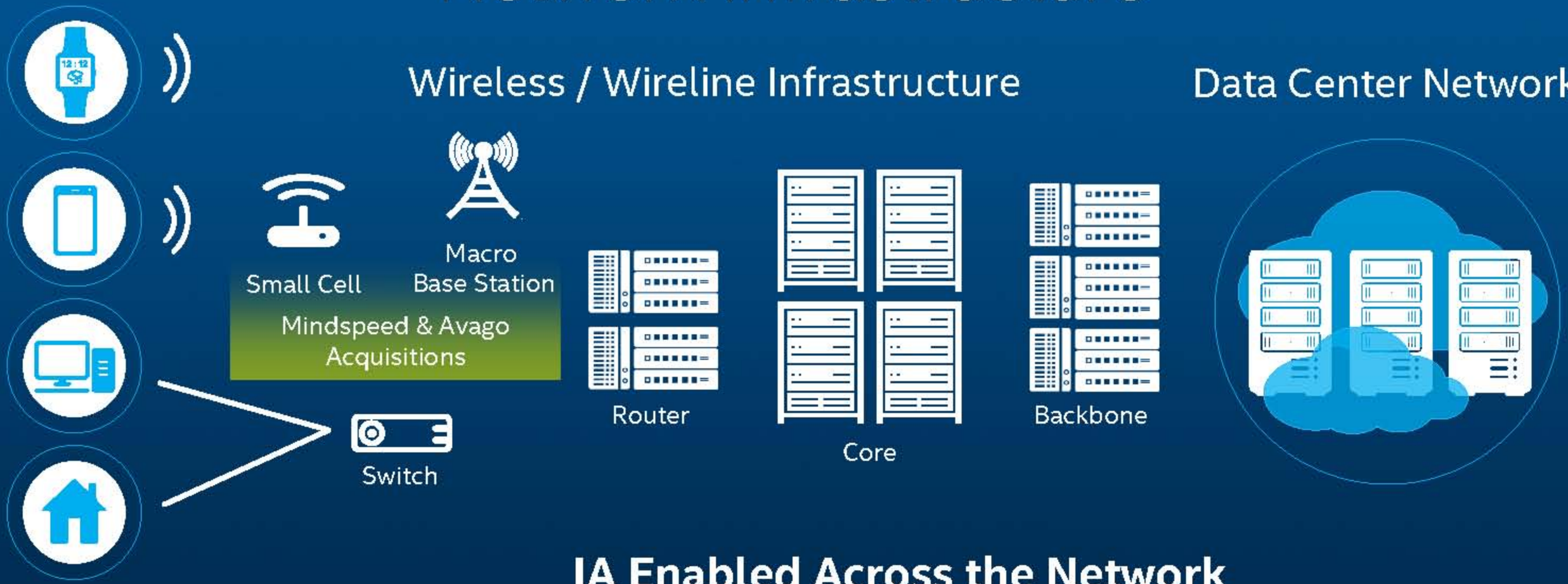


Source: Intel

Four Growth Drivers



Network Infrastructure



IA Enabled Across the Network

STEP 1: Consolidate workloads on Intel Architecture

STEP 2: Virtualize & automate the network (NFV / SDN)

NFV / SDN Growth

Accelerated network transformation

2011

NFV Research Results

2012

9 Use Case Definitions

ETSI World Class Standards

2013

Proof-of-Concepts

2014

Pilots + 1st Commercial Deployments

at&t
BT
Telefónica
UBS
Alibaba Group
verizon wireless
SK telecom
Nasdaq
中国移动通信 CHINA MOBILE
Tencent 腾讯

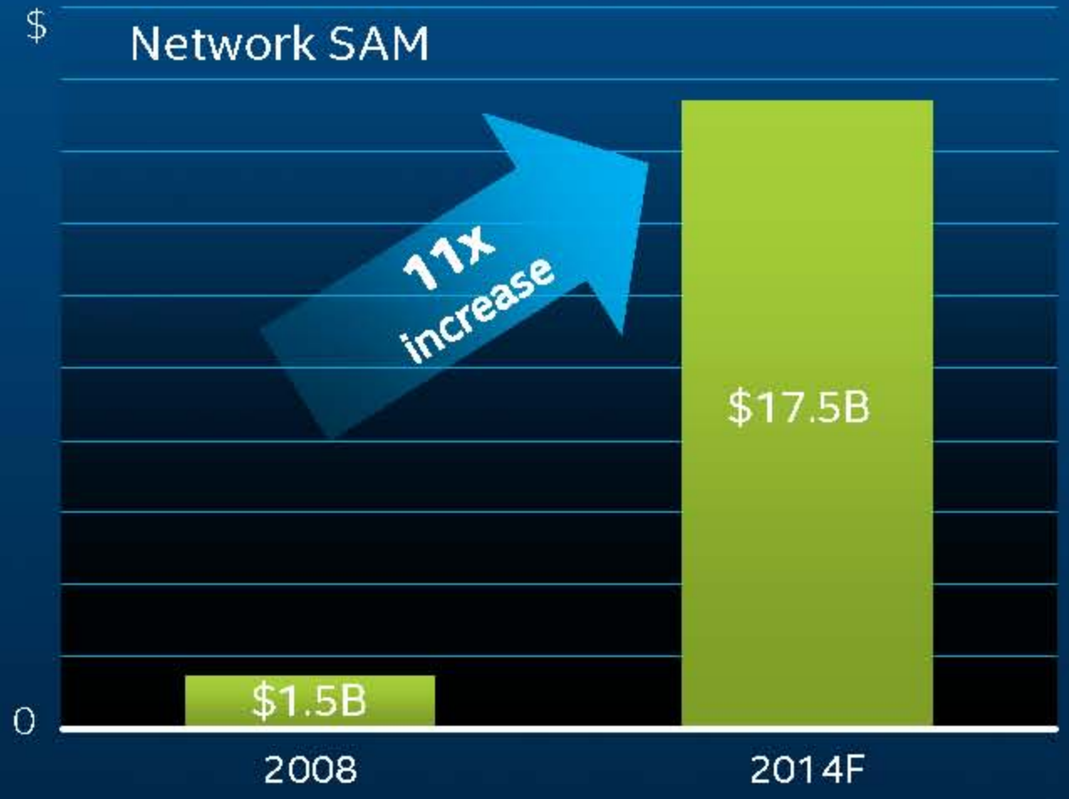
Alcatel-Lucent brings IP routing to cloud with most complete portfolio of virtualized IP Edge router functions

"...demonstrating 320G half duplex, **or greater than 2x better than competitor offers**, for a virtualized Provider Edge routing application in a single x86 server. "
- November 12, 2013

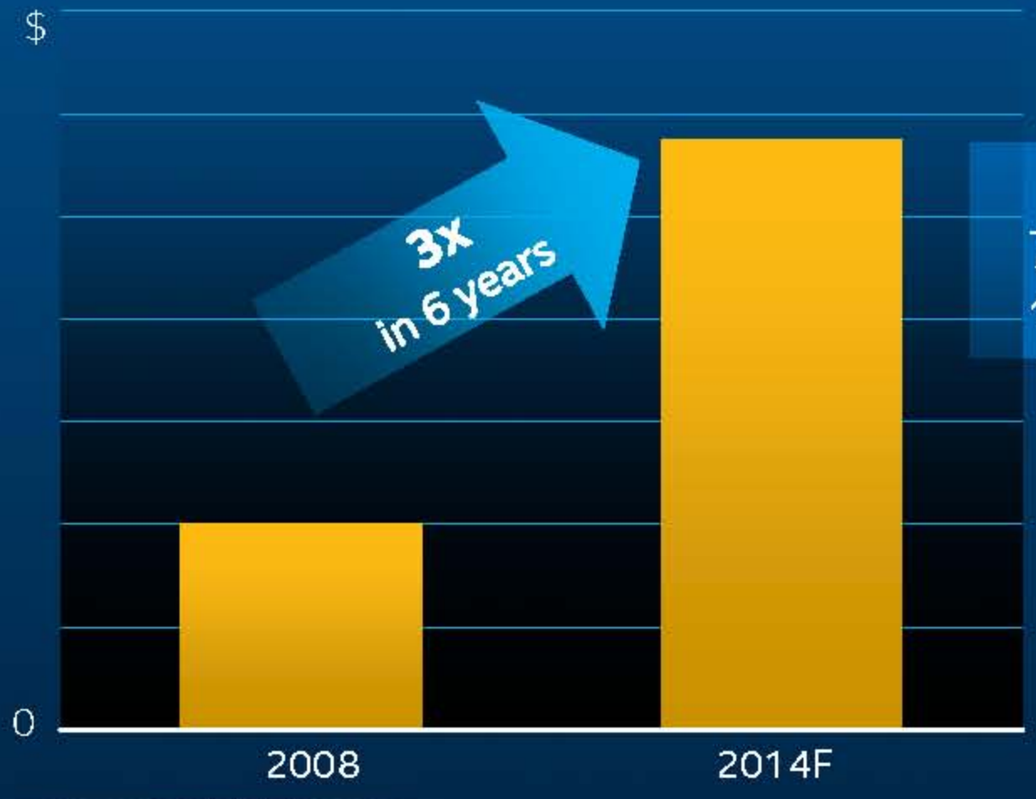
Other names and brands may be claimed as the property of others.

Maximizing Intel Opportunity & Return

Growing Network Opportunity



Growing Intel Revenue



2014
7.5% MSS
↑ 2.5pts YoY

2014
First $1B+ Year

Forecast is subject to change without notice

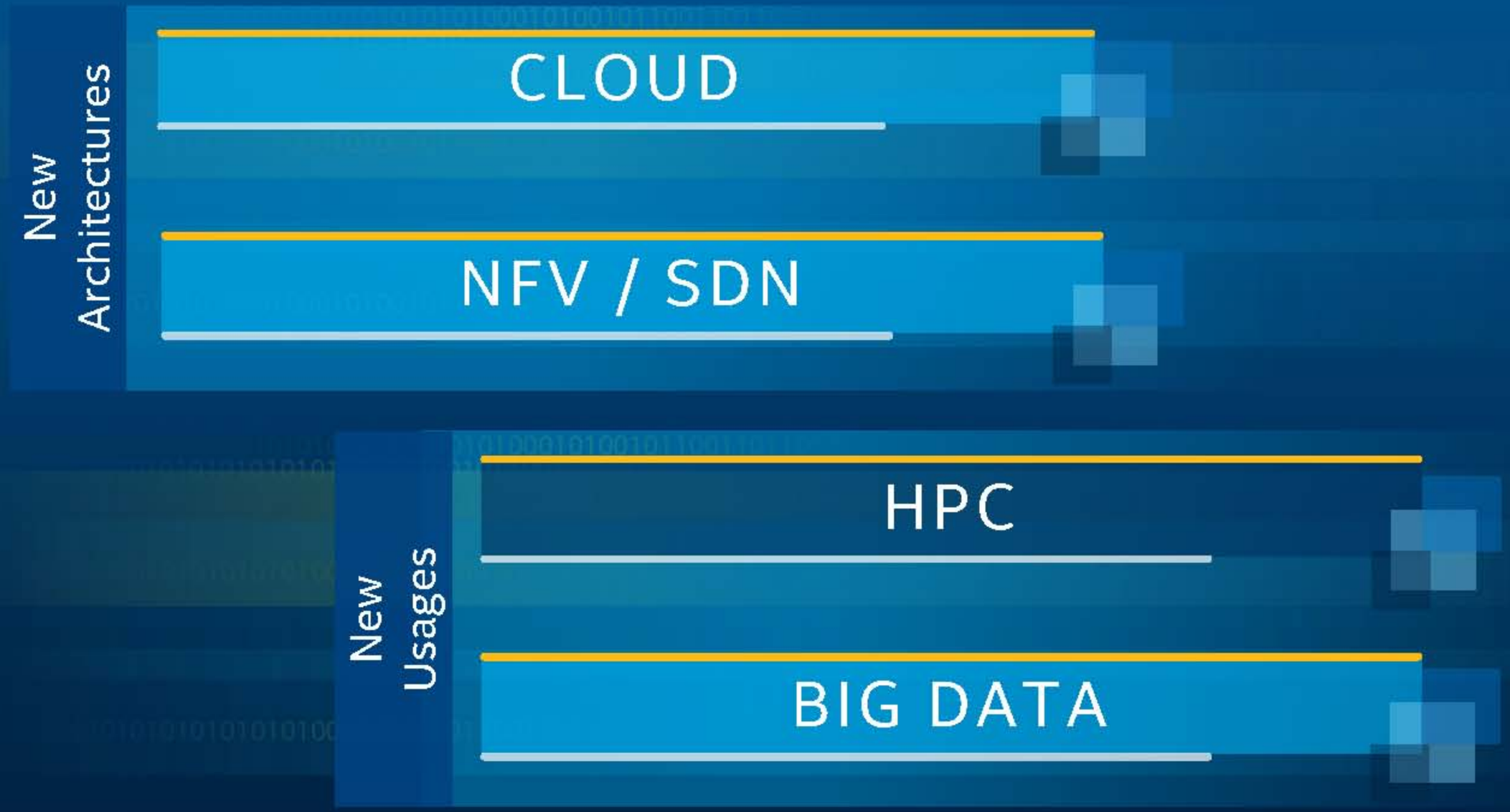
NFV / SDN Ecosystem Growth

Intel® Network Builders Program

Growing the ecosystem to accelerate NFV and SDN solutions

>100 members enabling IA-based open standards solutions for Networking

Four Growth Drivers



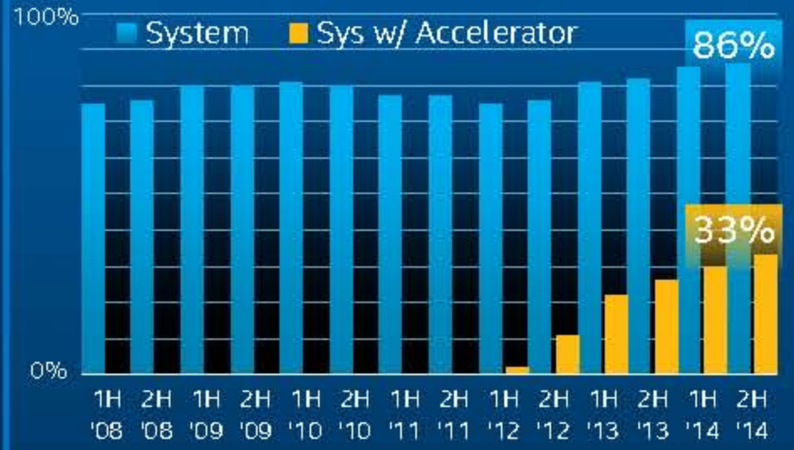
High Performance Computing Growth

Government & Research

$174M
"Trinity"

NNSA
National Nuclear Security Administration

Top 500 MSS



62%
Top 500
FLOP CAGR

71%
Intel Top 500
FLOP CAGR

Commercial

Move from Physical to Digital

2003-2013

70% to 92%
Xeon
MSS

11%
Xeon
Unit CAGR

New Usages

Big Data

PayPal — Real-time analytics

Children's Mercy KANSAS CITY — Genomic sequencing

Cloud

% of HPC spend in Public Cloud

TODAY ~10%

BY 2017 ~20%

Sources: Top 500.org, hpcuserforum, HPCwire, IDC, Intel

HPC: Maximizing Intel Value

Maximize Si Opportunity

- #1 supercomputer runs on Xeon Phi
- 2nd gen design wins > 1st gen sales to date
- >50 system providers committed

Expand System Capability

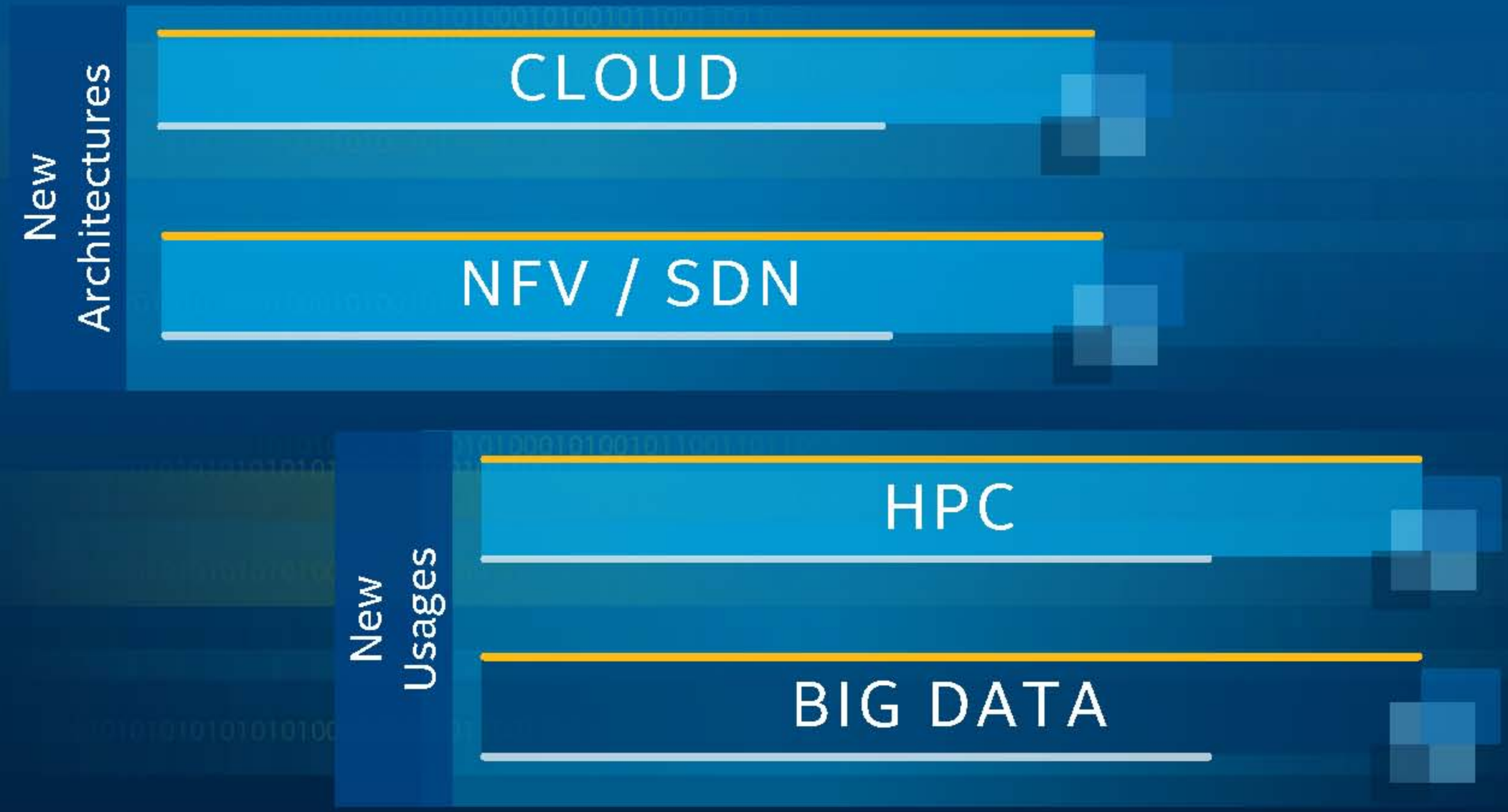
- TrueScale Infiniband growth 50% YoY
- Design wins for Omni Path integrated fabric
- HPC software stack investment

Advance the Parallel Ecosystem

- 41 Intel Parallel Computing Centers
- 14 countries
- 70+ apps

Source: Intel

Four Growth Drivers

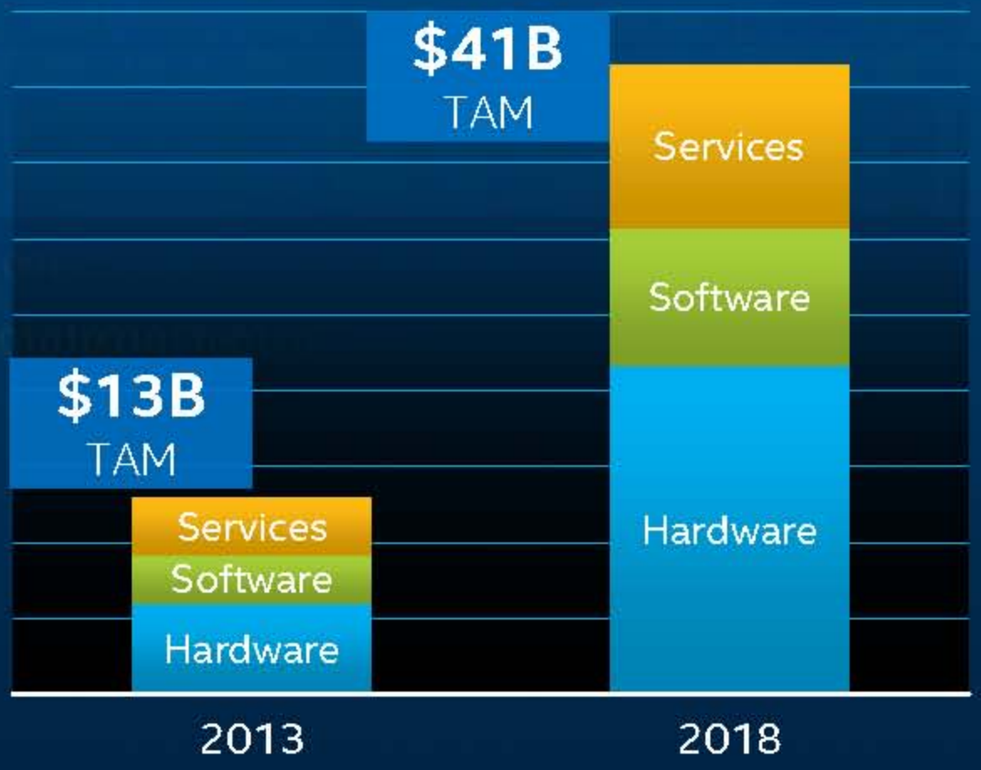


Jevons Paradox: Big Data Growth

New discoveries drive massive amounts of compute & storage

Average Server Cost
2003-2013
40%

Storage Cost / GB
2003-2013
90%



Sources: IDC WW Big Data Forecast 2014-2018, Intel estimates

Big Data: Maximizing Intel Value

Accelerate implementation of Big Data solutions
through optimized platform & tangible proof points

cloudera®

Hadoop
Distribution

THE MICHAEL J. FOX FOUNDATION
FOR PARKINSON'S RESEARCH

KNIGHT
CANCER INSTITUTE
Oregon Health & Science University

A-wear
Wearables-to-Analytics
Developer Platform

- Addressing a $41B TAM by 2018
- Dramatic server growth YoY
- Hadoop optimized for IA
- Industry enabling with PaaS
- Builds upon full Intel portfolio:
  Xeon, Xeon Phi, fabrics, flash, FPGA

Source: IDC WW Big Data Forecast 2014-2018

BIG DATA
analytics

BASIS
An Intel Company

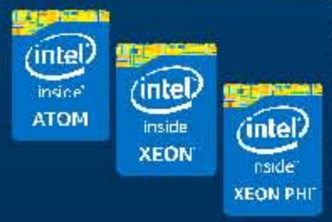
Products and Technologies

Processors: Standard to Custom

Silicon Photonics

Rack Scale Architecture

Standard to Custom Roadmap

100s SKUs	Grantley **7** node controllers **3** FPGAs **1** memory ASIC	Grantley **10** motherboards **28** NICs	Grantley **35** SKUs	**4** in Grantley **2** in development	**>10** customer engagements
STANDARD SILICON	**CUSTOM LOGIC ENABLING**	**SYSTEM DESIGN SERVICES**	**CUSTOM CPU OPTIMIZATIONS**	**CUSTOMER FEATURE INTEGRATION**	**FULL CUSTOM CPU**
	Proprietary interface licensing & support	Board design, electrical, mechanical	Performance enhancements to match customer workload	Inclusion of customer's IP in standard product	Customer specified product

In the past 4 months, custom CPUs launched

amazon web services™
C4

Microsoft
Azure-G

ORACLE®
Exalogic Elastic Cloud

hp
Moonshot
Xeon with Intel® Iris Graphics

3 Market Opportunities

Silicon Photonics

Shipping Now

Data Centers

Fiber Optic Replacement

Disruptive Cost Structure

Cost / Bandwidth Density	100G	400G	1TB
Intel Silicon Photonics	x	y	z
Other Silicon Photonics	~2x	~3y	~4z
Discrete Fiber	~3x	~6y	~10z

2015

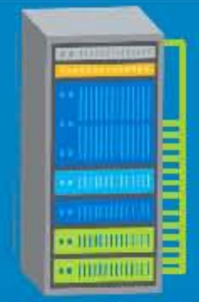
HPC

Copper Replacement

I/O = 30% of System Cost

- Remove density constraints
- Serviceability & reliability
- Lower power

2015



Rack Scale Architecture

Copper Replacement

100Gb/s in Rack

Copper	100Gb/s limited to **3m**
Silicon Photonics	100 Gb/s reach of up to **2km**

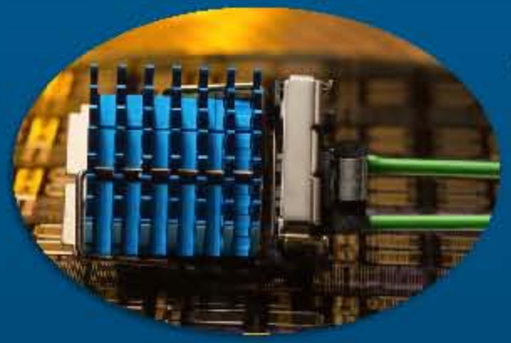
Only fully integrated silicon solution; benefitting from Moore's Law

Source: Intel

Silicon Photonics: Moving Data with Lasers

Industry Standard Cabling & Connectors

Intel Silicon Photonics module



CORNING, USCONEC, FOCI, TE connectivity, molex, Rosenberger

Multiple suppliers commercializing MXC standard

Design Wins

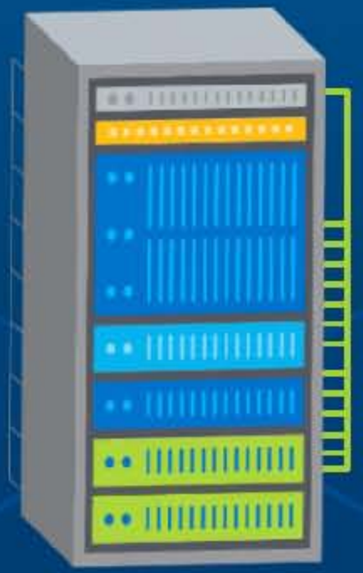
ADVANTECH, ALTERA, ARISTA, Baidu 百度, ciena, CRAY, FUJITSU, HUAWEI, inspur 浪潮, ixia, ONE STOP SYSTEMS, sgi, SPIRENT Communications, tabula

Silicon Photonics Revenue Forecast

Source: Intel

Rack Scale Architecture

2015



- With Cloud the rack becomes the unit of compute
- Compose & decompose resources dynamically based on application need

Intel Ethernet controller & switch

intel inside XEON

Intel Silicon Photonics

intel inside XEON PHI

intel inside ATOM

Intel SSD

Up to 1.5X servers per rack

Up to 5X reduction in provisioned power

Up to 3X fewer cables

Customers & Partners

Alibaba.com Baidu 百度 DELL hp HUAWEI Microsoft inspur 浪潮 openstack Tencent 腾讯 Open Datacenter Quanta vmware

Competition

High interest in data center business

~~16~~ 12 ARM vendors

OpenPOWER™

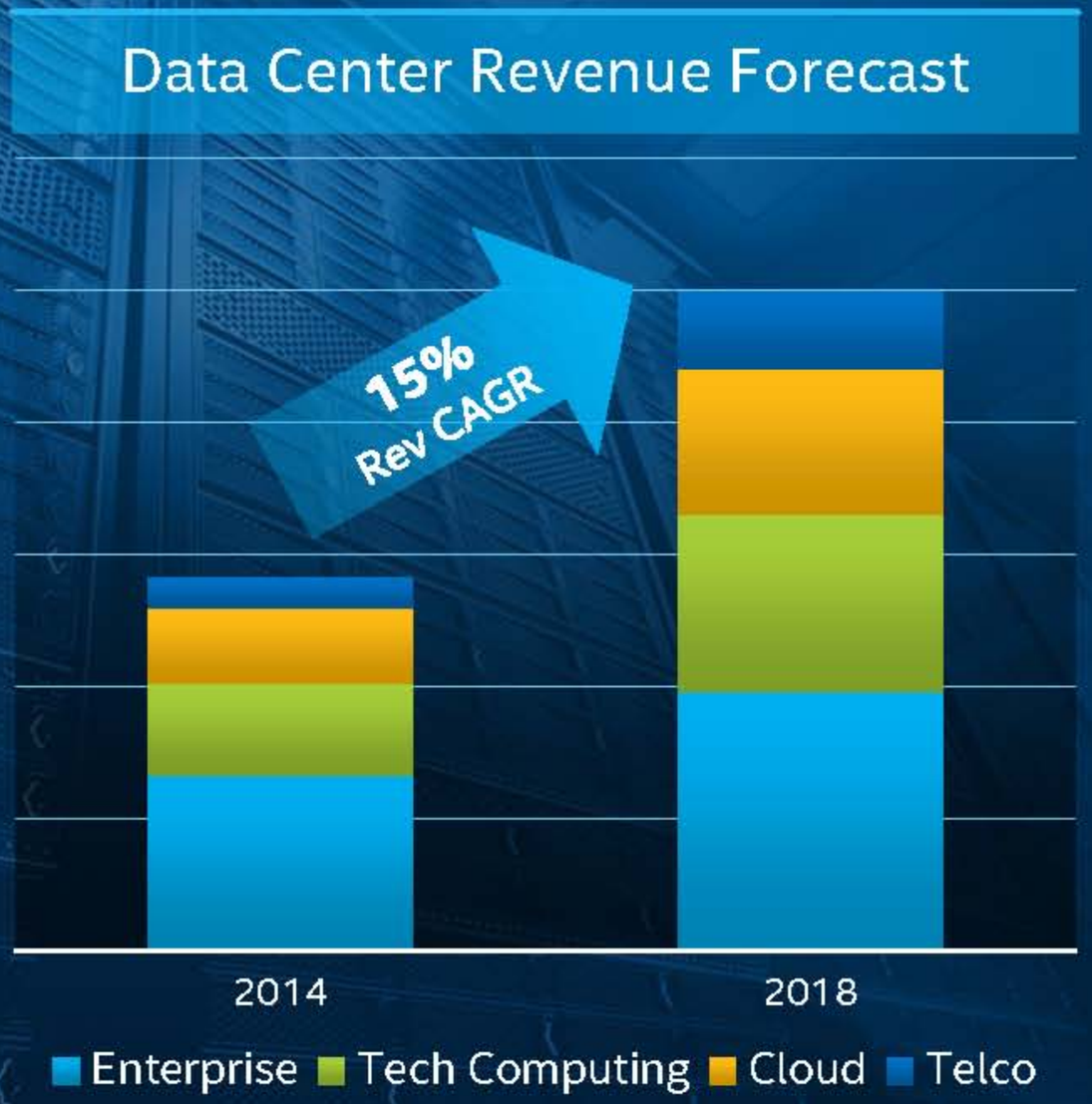
AMD

Why Intel

- Leadership roadmap across Server, Storage & Network
- Customization for targeted workloads
- ~$2B annual R&D investment
- Broadest ecosystem & compatibility
- Best perf / TCO

> Any time I work out the cost models, it's not quite there. Intel is also easier to work with on some of the custom work that Amazon requires.
>
> - James Hamilton, vice president for Amazon Web Services

Data Center Summary



- Industry trends create continued revenue growth opportunities

Cloud	NFV / SDN	HPC	Big Data

- Investing to win across Server, Storage, network
  - Performance and TCO leadership
  - Expanding technology portfolio – fabrics, silicon photonics, customization driving revenue growth
- Revenue CAGR of ~15% through 2018

For More Information

Demos

NFV Service Chaining

Big Data Analytics in Retail

Rack Scale Architecture

Silicon Photonics in HPC

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All dates, forecasts and products specified in this presentation are subject to change without notice. This presentation will not be updated to reflect any such changes.

*Other names and brands may be claimed as the property of others.

Risk Factors

The statements in the presentations and other commentary that refer to plans and expectations for the fourth quarter, the year and the future are forward-looking statements that involve a number of risks and uncertainties. Words such as "anticipates," "expects," "intends," "plans," "believes," "seeks," "estimates," "may," "will," "should" and their variations identify forward-looking statements. Statements that refer to or are based on projections, uncertain events or assumptions also identify forward-looking statements. Many factors could affect Intel's actual results, and variances from Intel's current expectations regarding such factors could cause actual results to differ materially from those expressed in these forward-looking statements. Intel presently considers the following to be important factors that could cause actual results to differ materially from the company's expectations.

- Demand for Intel's products is highly variable and could differ from Intel's expectations due to factors including changes in the business and economic conditions; consumer confidence or income levels; customer acceptance of Intel's and competitors' products; competitive and pricing pressures, including actions taken by competitors; supply constraints and other disruptions affecting customers; changes in customer order patterns including order cancellations; and changes in the level of inventory at customers.
- Intel's gross margin percentage could vary significantly from expectations based on capacity utilization; variations in inventory valuation, including variations related to the timing of qualifying products for sale; changes in revenue levels; segment product mix; the timing and execution of the manufacturing ramp and associated costs; excess or obsolete inventory; changes in unit costs; defects or disruptions in the supply of materials or resources; and product manufacturing quality/yields. Variations in gross margin may also be caused by the timing of Intel product introductions and related expenses, including marketing expenses, and Intel's ability to respond quickly to technological developments and to introduce new features into existing products, which may result in restructuring and asset impairment charges.
- Intel operates in highly competitive industries and its operations have high costs that are either fixed or difficult to reduce in the short term.
- The declaration and rate of dividend payments and the amount and timing of Intel's stock buyback program are at the discretion of Intel's board of directors, and plans for future dividends and stock buy backs and could be affected by changes in Intel's priorities for the use of cash, such as operational spending, capital spending, acquisitions, and because of changes to Intel's cash flows and changes in tax laws.
- Intel's expected tax rate is based on current tax law and current expected income and may be affected by the jurisdictions in which profits are determined to be earned and taxed; changes in the estimates of credits, benefits and deductions; the resolution of issues arising from tax audits with various authorities, including payment of interest and penalties; and the ability to realize deferred tax assets.
- Gains or losses from equity securities and interest and other could vary from expectations depending on gains or losses on the sale, exchange, change in the fair value or impairments of debt and equity investments; interest rates; cash balances; and changes in fair value of derivative instruments.
- Intel's results could be affected by adverse economic, social, political and physical/infrastructure conditions in countries where Intel, its customers or its suppliers operate, including military conflict and other security risks, natural disasters, infrastructure disruptions, health concerns and fluctuations in currency exchange rates.
- Intel's results could be affected by the timing of closing of acquisitions, divestitures and other significant transactions.
- Intel's results could be affected by adverse effects associated with product defects and errata (deviations from published specifications), and by litigation or regulatory matters involving intellectual property, stockholder, consumer, antitrust, disclosure and other issues. An unfavorable ruling could include monetary damages or an injunction prohibiting Intel from manufacturing or selling one or more products, precluding particular business practices, impacting Intel's ability to design its products, or requiring other remedies such as compulsory licensing of intellectual property.

A detailed discussion of these and other factors that could affect Intel's results is included in Intel's SEC filings, including the company's most recent Form 10-Q, Form 10-K and earnings release.

INVESTOR MEETING 2014

SANTA CLARA, NOVEMBER 20