



Week 7:

Delivery of Information Goods

**What if the Product is not
Physical?**

Learning Objectives

- Information Goods
- The transformation of the video rental business
- How the iPod changed the world
- The transformation of the software industry

Information goods

- A type of commodity whose main market value is derived from the information it contains

- Examples

- Music CDs
- DVDs
- Books



- Not all information goods are digital
 - CDs and DVDs are physical products; the information contained in them is digital

Information goods are different

- Increasing digitization → Physical channels can be bypassed
- Where to you access / purchase the music you listen to?
- How often do you purchase music CD?
- Why?



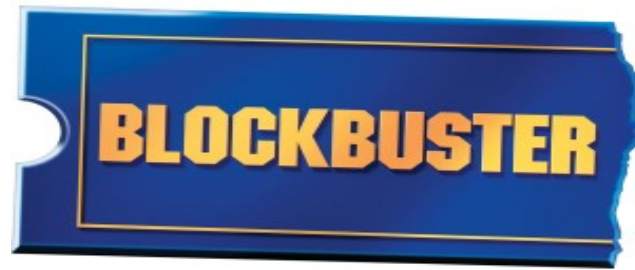
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Information goods are different

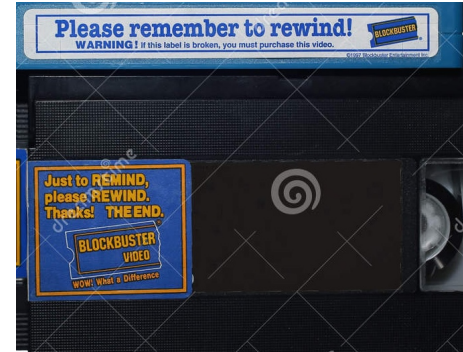
- What Video Content do you View?
- Where to you View it?
- Why that channel?





In 2001:

- 33% market share
- Broad physical footprint
 - Many stores
 - Good collection of movies
- Profitable sales





The format war

- The move towards DVD technology

- Circuit City's competing technology

DIVX



- Lack of consensus stalls Blockbuster's effort to replace its inventory with DVDs

Disruptive innovations



- New products / technologies that radically change the industry landscape
- Affect
 - Core activities
 - Core assets
- DVDs struck at Blockbuster's core assets

Disruptive innovations



Products & Industries Rocked by Disruptive Technologies

Established Technology	Disruptive Technology
Mini-computer	PCs and networked Workstations
Full Service Stock Brokers	On-line Brokers
Bricks And Mortar Retailing	On-line Retailing
Standard Textbooks	Digital Textbook Publishing
Offset Printing	Digital Printing
Open Heart Surgery	Arthroscopic And Endoscopic Surgery
PC Computing	Tablet Computing

Blockbuster v/s Netflix



- Netflix obviated the need for physical stores → significant cost savings
- Other advantages
 - Bigger selection (not restricted by what is available in the storefront)
 - Customer reviews
 - Movie recommendations



The Netflix model



- What did Netflix do?
- Competing against Blockbuster, did Netflix...
 - Threaten core assets?
 - Threaten core activities?
- Would Netflix have been able to take on Blockbuster in VHS rentals?

Manufacturing costs

- What are the manufacturing costs for video?
- For a DVD ?



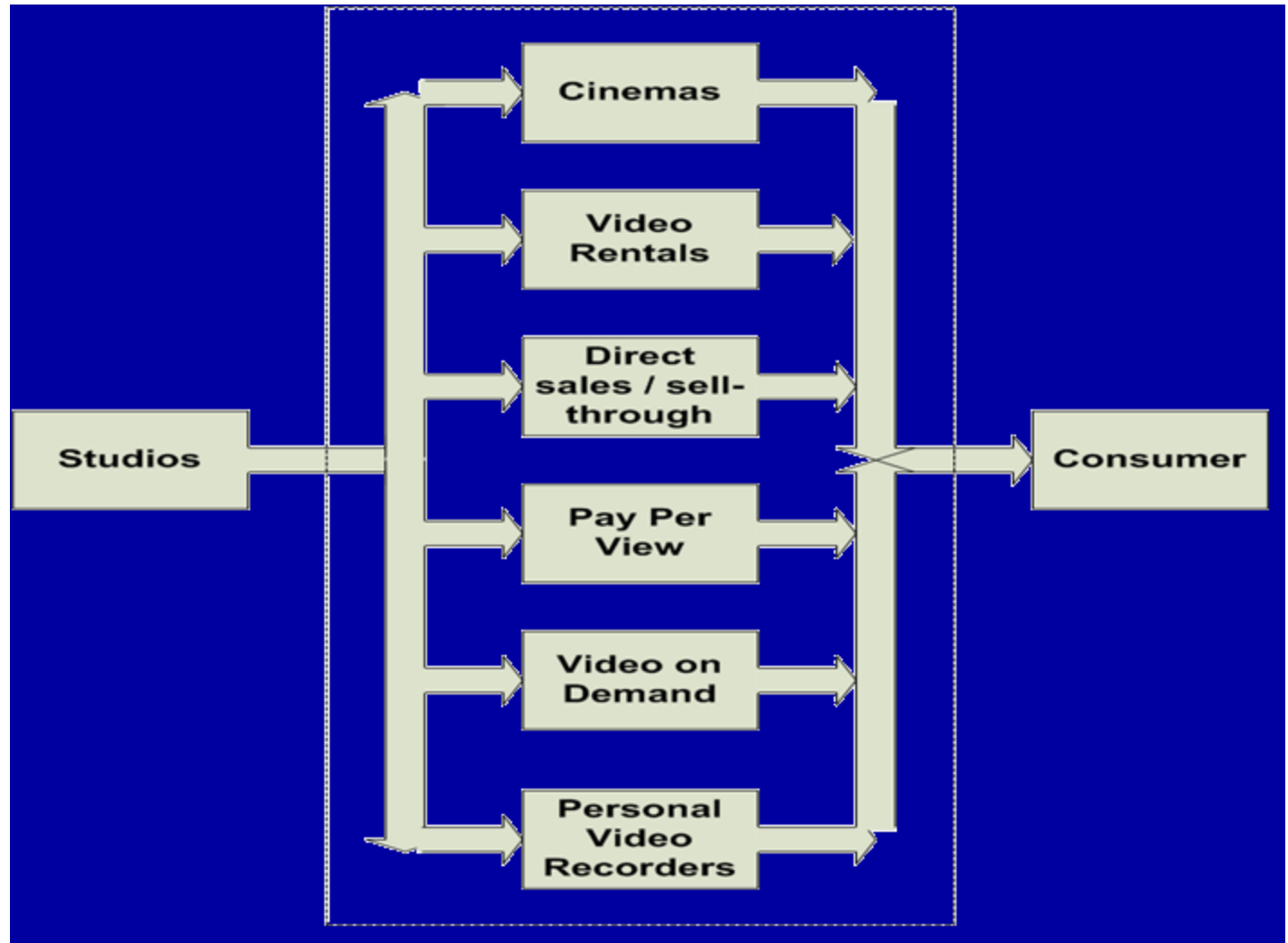
Manufacturing Costs



- Movie initial Production can be very expensive (\$ 15,000 – \$425,000,000)
- Information goods cost almost nothing to replicate
- A DVD can be copied for less than \$ 1.00 - a car or a bicycle cannot
- How long does it take an artist to cut a disc?
How long does it take to copy?



The Movie industry's value chain



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The iPod



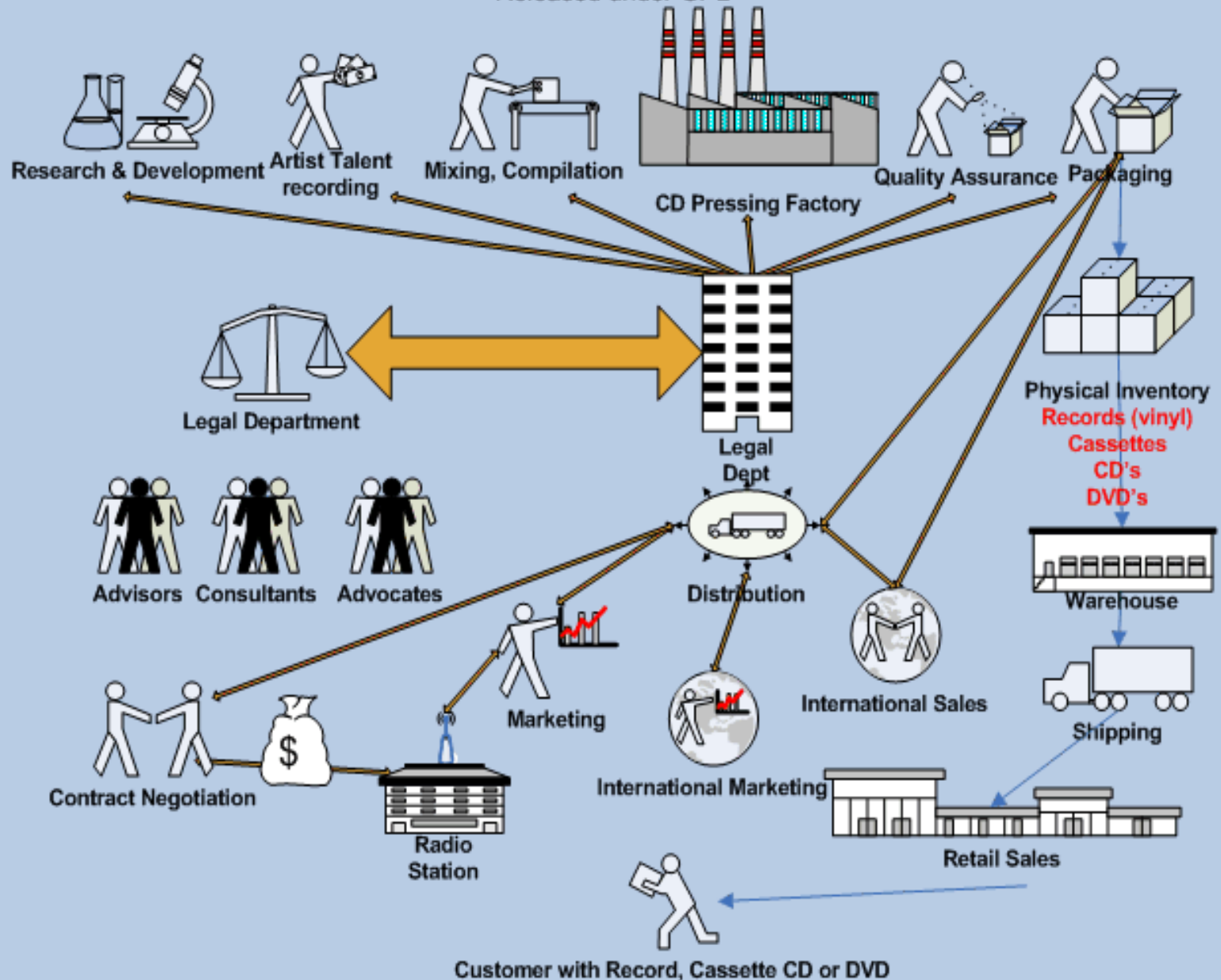
The music business

- Who are the various players in the music business?
- Who controls the music business?
- How does piracy affect the industry?




The OLD Music Industry Distribution Model

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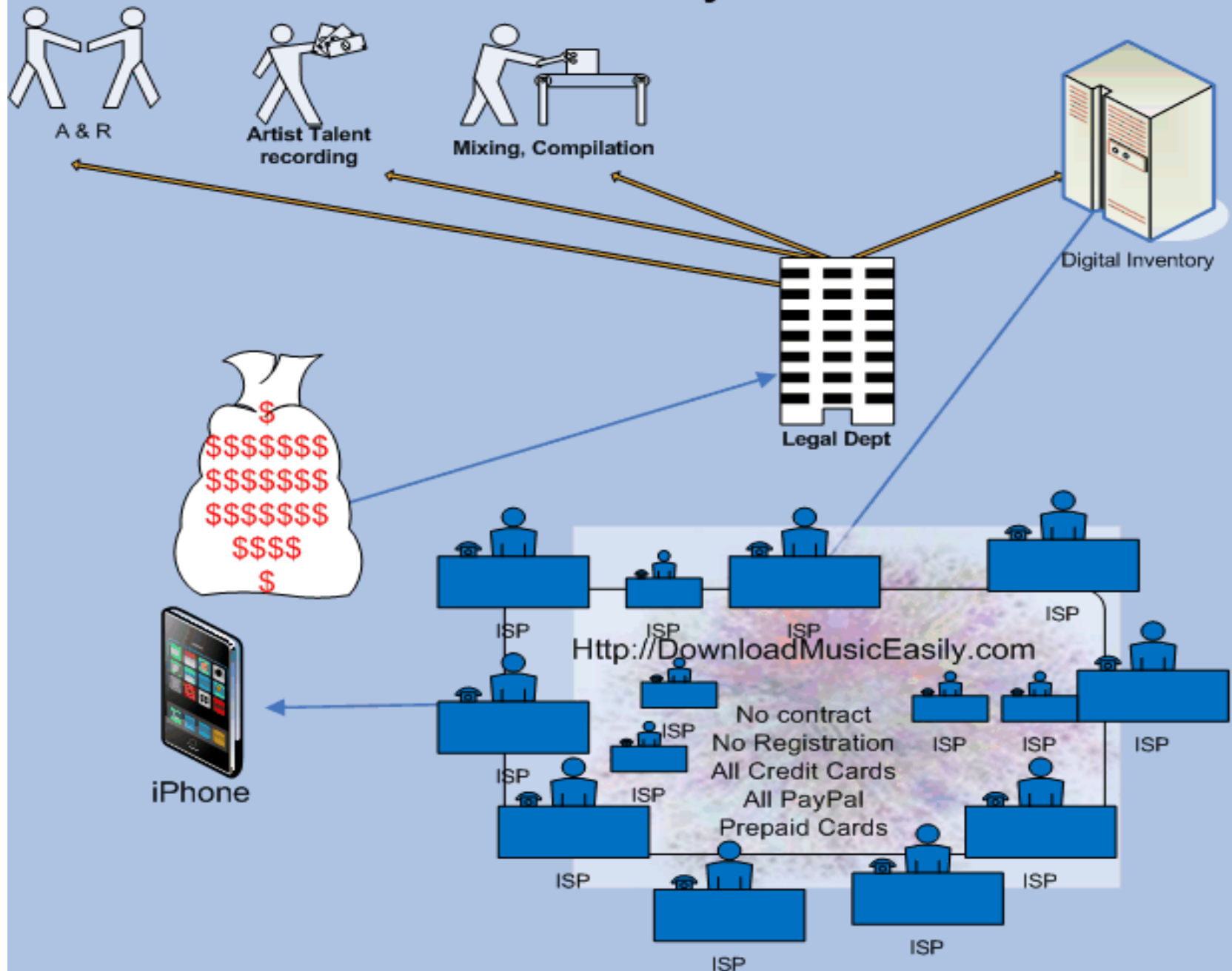


Enter iTunes



- iTunes store
 - 99 cents / track
 - Compared to \$15.00 for a CD, on which you would listen only to a few tracks
- **iPod** = consumer segment
-  iTunes Store = distribution channel

The New Music Industry Distribution Model





The next phase

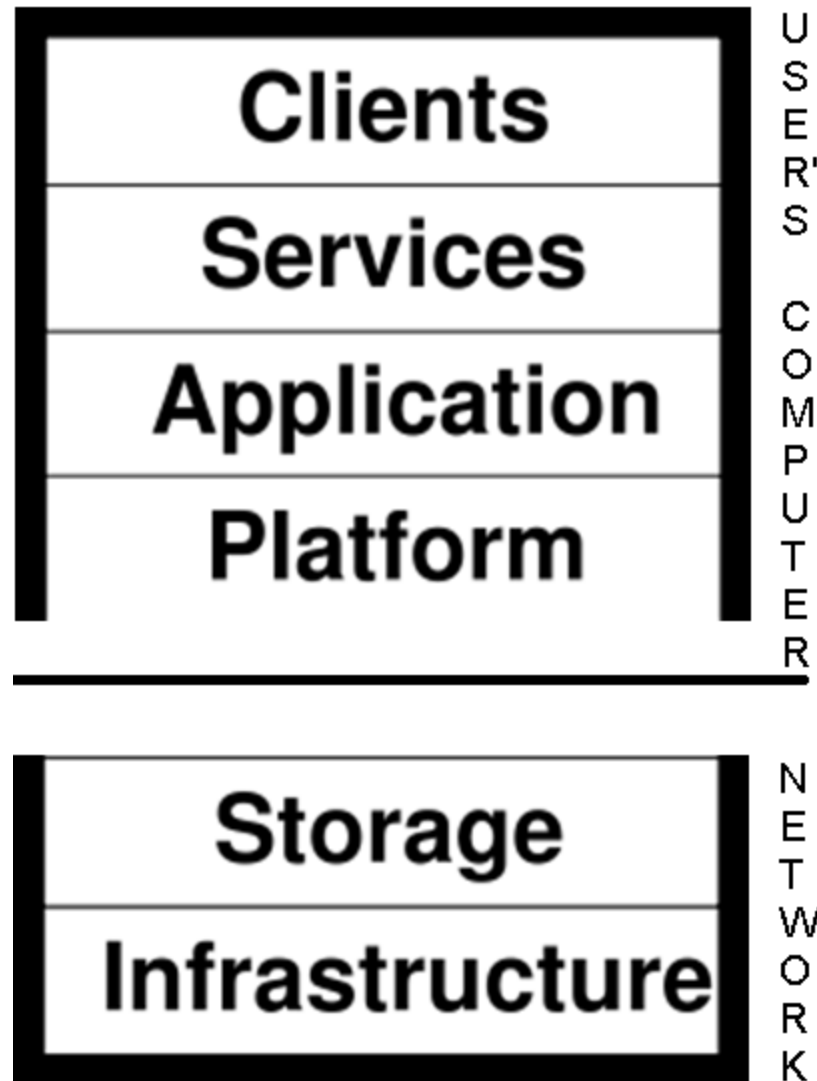
- Of the 99 cents per download
 - Apple makes only 3-4 cents
 - Record labels make 65 cents – to split among:
 - Artists
 - Publisher
 - the Label
- Apple is pushing up the value chain, and is trying to compete with record labels



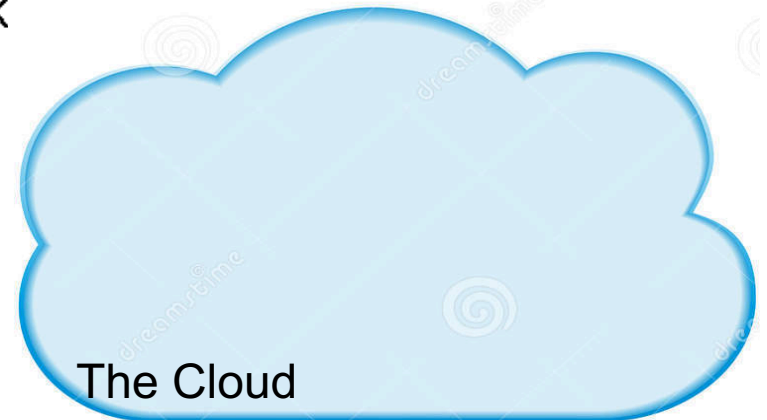
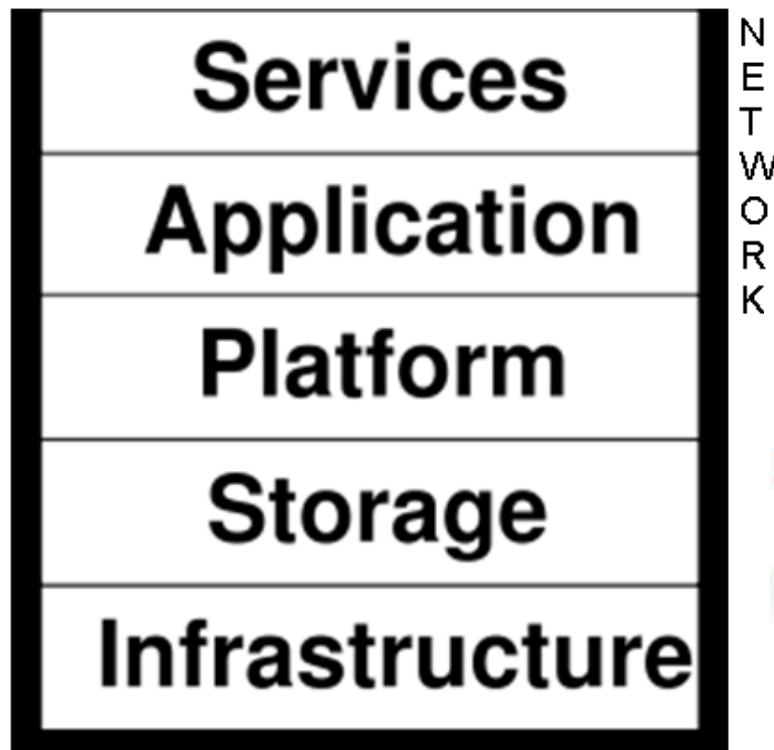
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Traditional Software Model



Software as a Service (SaaS) model



Background

- Enabling factors for SaaS
 - Computing becomes ubiquitous
 - Multiplicity of devices
 - Unlimited bandwidth; inexpensive storage
 - Popularity of the SoA model (XML-based services)

What is Software as a Service?

- SaaS is a software application delivery model
- The vendor develops a web-native software application
- The vendor hosts and operates the application (independently or via third-party)
- Customers use the application(s) via web-browser
- Customers do not pay for owning the software itself but rather for using it



Key characteristics

- Lower capital expenditure
- Location independence
- Device independence
- Sharing of resources and costs



Key characteristics (contd.)

- Central monitoring of performance
- Reliability, through redundancy
- Scalability
- Security, through centralization
- Sustainability



Advantages / Benefits

- For software developers / vendors:
 - Software can be developed for a single specification – the browser
 - Open standards lead to more independent developers providing extensions
 - More effective licensing of software
 - Ability to deliver updates on a regular basis




Advantages / Benefits

- For companies / businesses:
 - Better collaboration
 - Facilitates ubiquity – employees on the go, telecommuters, dispersed teams
 - Effective licensing of software
 - Ability to receive regular updates



Advantages

- For small businesses / individuals
 - Enterprise-class software at low prices
 - Salesforce.com, Zoho
 - Almost zero setup costs
 - eg: Amazon SimpleDB  SimpleDB
 - (Basically, you don't need to own the phone company to make a phone call!)
- Collaboration



- Questions!

Enjoy your Break

