



**VIDEO STUDY GUIDE : THE VIRTUAL REVOLUTION -  
PART 3 - THE COST OF FREE**

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**KEY ECONOMIC CONCEPTS ILLUSTRATED IN THIS DOCUMENTARY**

- 1. THE IMPORTANCE OF TECHNOLOGICAL INNOVATION IN CREATING MARKETS , EXPANDING MARKETS , INCREASING PRODUCTIVITY , AND LOWERING COSTS AS WELL AS PRICES , INCREASING WEALTH AND THE STANDARD OF LIVING**
  - 2. THE IMPORTANCE OF TECHNOLOGICAL INNOVATION IN PROMOTING THE GROWTH AND EMPOWERMENT OF HUMAN CAPITAL**
  - 3. THE IMPACT OF TECHNOLOGICAL INNOVATION ON ORGANIZATIONS , INSTITUTIONS , AND CULTURES**
  - 4. CHARACTERISTICS OF BUSINESS ORGANIZATIONS > START UPS ; ANGEL INVESTORS , VENTURE CAPITAL , ENTREPRENEURS > CORPORATIONS ; STOCK , PROFITS , IMPORTANCE OF RESEARCH AND DEVELOPMENT**
  - 5. THE LIMITATIONS OF GOVERNMENT INTERVENTIONS IN AN ECONOMY AS WELL AS SOCIALIST ECONOMIC CONCEPTS AND PRINCIPLES**
  - 6. THE BENEFITS OF FREE MARKET CONCEPTS AND PRINCIPLES > ADAM SMITH'S INVISIBLE HAND ; PRIVATE OWNERSHIP , INCENTIVE , COMPETITION , AND THE LAW OF UNINTENDED CONSEQUENCES**
  - 7. HOW NEW MARKETING TECHNIQUES TAKE ADVANTAGE OF DEMOGRAPHICS NEVER BEFORE AVAILABLE TO CHANGE MARKETS**
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**INTRODUCTION**

**DR. KROTOWSKI SAYS THAT THE WEB'S GIFTS COME AT A PRICE . WHAT PRICE ?**

**DR. KROTOWSKI SAYS THAT THE THOUGHTS AND DESIRES WE EXPRESS ON THE WEB ARE BEING TRACED , TRACKED , AND TRADED FOR WHAT ?**

**LT. CORNEL GREG CONTI OF THE WEST POINT MILITARY ACADEMY SAYS WE**

**ALL WANT SOMETHING FOR NOTHING , BUT IT DOES NOT WORK THAT WAY  
AND WE HAVE TO CONSIDER WHAT WE MUST \_\_\_\_\_  
IN RETURN FOR WHAT WE ARE SEEKING**

**REMARKABLE STATISTICS :**

- 1. IN A MONTH , GOOGLE CONDUCTS HOW MANY SEARCHES ?**
- 2. IN A DAY , HOW MANY PICTURES ARE UPLOADED TO FLICKR ?**
- 3. IN A MONTH , OVER \_\_\_\_\_ MILLION PEOPLE BROWSE  
THROUGH TENS OF MILLIONS OF BLOGS**

**AUTHOR ANDREW KEEN COMPARES THE TITANS OF SILICON VALLEY ( THE  
HIGH TECH INDUSTRY ) AND THE WEB AGE TO WHO ?**

**COMMERCE ON THE WEB > HOW DID WE GET HERE ?**

**PIZZA HUT WAS A PIONEER OF WHAT ?**

**WHAT WAS PIZZA HUT'S SERVICE CALLED ?**

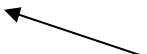
**WHERE DID THE WEB'S FIRST TRUE COMMERCIAL VENTURE TAKE ROOT  
AND WHAT WAS IT ?**

**IN YOUR OWN WORDS , WHAT WAS THE FOUNDING DREAM BEHIND  
AMAZON.COM ?**

**BETWEEN 1995 AND 2000 OVER \_\_\_\_\_ MILLION .COM NAMES WERE  
REGISTERED**

**DR. KROTOWSKI REMINDS US THAT IN EARLY 2000 THE .COM BUBBLE BURST  
AND AN ESTIMATED 3.5 BILLION IN “ ON PAPER “ WEALTH VANISHED .  
INTERNET COMPANIES HAD GREAT NAMES AND SOME GREAT IDEAS , BUT  
NOBODY HAD FIGURED OUT WHAT ?**

**THE COMPANY THAT EMERGED BY FIGURING OUT HOW TO \_\_\_\_\_ HAS  
EFFECTIVELY TURNED ITS CONSUMERS INTO \_\_\_\_\_ BY**



**TURNING OUR \_\_\_\_\_ INTO A MONEY MAKER .  
THE WORLD THAT GOOGLE HAS BUILT**

**IN 2009 GOOGLE EARNED OVER 6.5 BILLION IN PROFITS FROM WHAT ?**

**AUTHOR CHRIS ANDERSON SAYS THAT GOOGLE HAS NOT DEVELOPED A MONOPOLY ON SEARCH , BUT ON WHAT ?**

**LARRY PAIGE AND SERGI BRIN DEVELOPED AN \_\_\_\_\_ TO  
CALCULATE \_\_\_\_\_ BETWEEN \_\_\_\_\_ ON THE WEB**

**IN YOUR OWN WORDS , WHY WAS THIS \_\_\_\_\_ IMPORTANT ?**

**WHAT PROBLEM DID GOOGLE RUN INTO AS SEARCH INCREASED ?**

**TRUE OR FALSE , AS THE WEB EXPANDED , GOOGLE SEARCH BECAME MORE EFFECTIVE ?**

**AT THE BEGINNING PAIGE AND BRIN SHUNNED ADVERTISING , BUT LATER CAME TO EMBRACE IT AS THEY INTRODUCED WHAT REVOLUTIONARY PRODUCT ?**

**IN YOUR OWN WORDS DESCRIBE WHY THIS \_\_\_\_\_ PRODUCT IS SO EFFECTIVE**

**ERIC SCHMITT , THE NOW FORMER CEO OF GOOGLE , SAYS THAT THE FIRST RULE OF THE INTERNET IS THAT YOU CAN SPEAK TO EACH INDIVIDUAL AS A DIFFERENT PERSON. THE WEB HAS BECOME A \_\_\_\_\_  
CASTING MECHANISM**

**PLACEMENT OF ADVERTISEMENTS RETURNED IN A GOOGLE SEARCH IS DETERMINED THROUGH A \_\_\_\_\_ PROCESS . BUT THE TOP SPOT DOES NOT GO TO THE HIGHEST \_\_\_\_\_**

**FOLLOWING MATHEMATICAL EQUATION DETERMINES HOW GOOGLE DECIDES WHICH ADVERTISEMENT GETS TOP BILLING ( SHOWN FIRST ) . WHAT DOES EACH OF THE EQUATION'S VARIABLES STAND FOR ?**

$$P = B \times Q$$

**IRONICALLY FOR THE ULTRA CAPITALIST MODEL TO WORK IT MUST REMAIN TRUE TO ITS NON – CAPITALIST ROOTS . THE WEB MUST :**

1. **REMAIN AN \_\_\_\_\_**
2. **BE EASY TO \_\_\_\_\_**
3. **NO \_\_\_\_\_ PER VIEW**
4. **NO AREAS OF \_\_\_\_\_**

**DR. KROTOWSKI ASKS , WHERE IS THE BOUNDARY LINE PROTECTING INFORMATION IN THE SEARCH FOR PROFIT ? HER GMAIL DEMONSTRATION SHOWS THAT THERE IS NO WHAT ?**

**ONLINE ADVERTISING DATA COLLECTION GOES BEYOND THE READING OF EMAIL CONTENT AND BROWSER TRACKING TO WHAT OTHER AREA ?**

**WHAT IS THE SOFTWARE DATA COLLECTION OBJECT CALLED THAT IS PLACED IN YOUR COMPUTER TO TRACK YOUR BEHAVIOR ?**

**DR. KROTOWSKI SAYS THE CONSUMER IS BECOMING THE \_\_\_\_\_**

**WEB COMMERCE IS NOW EVOLVING BY TAKING THE DATA COLLECTION AND ADVERTISING ONE STEP FURTHER AND PREDICTING , AS WELL AS SHAPING , WHAT YOU WILL BUY. JEFF BEZOS AND DR. KROTOWSKI SAY THE E-COMMERCE IS NOW BEING CHANGED BY WHAT TYPE OF ENGINE ?**

**PUT INTO YOUR OWN WORDS WHAT JEFF BEZOS SAYS ABOUT WHY ONLINE STORES ARE MORE EFFECTIVE THAN PHYSICAL STORES**

**WHAT COMPANY IS USING THE TYPE OF ENGINE REFERENCED ABOVE CALLED “ CINEMATCH ” TO BUILD THEIR BUSINESS ?**

**DR. KROTOWSKI SUGGESTS THAT THE TYPE OF ENGINE REFERENCED ABOVE MAY ACTUALLY BE DEFEATING THE WHOLE PURPOSE OF THE WEB . EXPLAIN THIS THOUGHT IN YOUR OWN WORDS .**

**INTERESTINGLY , DR. KROTOWSKI SAYS THAT WITH NOW HAVING OVERWHELMING CHOICE , CONSUMERS STILL DO WHAT ?**

**DR. KROTOWSKI SAYS THAT 16 YEARS OF WEB COMMERCE HAS TRANSFORMED WHAT \_\_\_\_\_ MEANS IN THE 21 ST CENTURY**

**ERIC SCHMITT SAYS THAT THE AWARE PERSON SEEMS PRAGMATIC ABOUT THE WEB . HE SAYS AS LONG AS THE WEB WORKS , AND ALL THE LAWS ARE FOLLOWED , CONSUMERS ARE WILLING TO SHARE \_\_\_\_\_ INFORMATION TO MAKE THEIR \_\_\_\_\_ BETTER**

**HAVE THERE BEEN FORMAL ATTEMPTS TO ASSERT CONTROL OVER PERSONAL DATA , AND HAVE THEY BEEN SUCCESSFUL ?**

**THE REAL CONCERN OVER WHO HAS POSSESSION OF PERSONAL DATA IS WHAT ?**

**WHAT HISTORICAL EXAMPLE DOES SOCIOLOGIST PROFESSOR DANA BOYD USE TO ILLUSTRATE THE CONCERN MENTIONED ABOVE ?**

**PROFESSOR BOYD SAYS THAT YOUNG PEOPLE UNDERSTAND THE SHORT TERM \_\_\_\_\_ , BUT NOT THE POSSIBLE LONG TERM IMPLICATIONS**

**DR. KROTOWSKI SAYS THAT THE YOUNG DO NOT UNDERSTAND WHAT ABOUT DIGITAL INFORMATION ?**

**DR. KROTOWSKI SAYS THAT , IRONICALLY THE WEB SEEMS TO HAVE MADE**

*US* \_\_\_\_\_

*PROFESSOR NIGEL SHADBOLT MAKES THE POINT THAT OUR DIGITAL  
FINGERPRINT IS AS IMPORTANT AS OUR* \_\_\_\_\_

**CONCLUSION**

*IN RETURN FOR A “ FREE WEB ” , OUR PRIVACY HAS BECOME A*

\_\_\_\_\_

*THE WEB HAS DISRUPTED OUR SENSE OF* \_\_\_\_\_ *AND*  
\_\_\_\_\_ *SPACE*