

Towards a Biblical View of Technology

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ABSTRACT: This paper describes how a biblical understanding of technology can change one's perspective, enabling one to think differently about technology; its purpose, its use, and its impact. As a result, the familiar technologies we interact with every day will be viewed differently. The paper will provide a theoretical foundation rooted in the Bible along with a variety of other scholarly sources. The integration of faith and technology described will enable a more critical evaluation of technology, thus making it more likely that technology enables productivity without enslaving its owner and ensuring that one's allegiance is not to a technological deity but to Jesus Christ. While this paper is focused on bringing a biblical perspective to the area of technology, the principles are applicable to other disciplines as well.

INTRODUCTION

This paper will address how one can bring biblical / theological understanding, even to a topic that can seem far removed from a text written thousands of years ago - that of technology. This paper will look at a faith integrative approach to technology; including an expanded definition of technology, its theological underpinning, its impact, and suggested frameworks and questions to improve one's use of technology. The purpose of this paper is to encourage the participant to think biblically and critically on the topic of technology, considering its impact on individuals and society. The examples provided will deepen the participant's concept of faith integration and encourage integration to be accomplished from a more holistic perspective. This paper will highlight how one professor has journeyed towards developing a more biblical view regarding the topic of technology. It will also provide examples of how students have been encouraged to begin a similar journey. Existing literature will be highlighted along with a framework and strategies that the author has found helpful while considering technology. Examples of how the author has integrated faith and technology into the classroom will be provided including specific discussion forums utilized. The paper will ask and answer the questions: What is a proper definition of technology? How can faith integration be accomplished in the arena of technology? What does the Bible say about technology? How does technology shape and influence us? How then should we interact with technology?

BACKGROUND

While attending a faith-integration seminar facilitated by Douglas and Rhonda Jacobsen in 2007, my view of faith integration was greatly expanded. Through their book, teachings, discussions, and exercises the Jacobsen's encouraged the participants to go deeper and to explore other methods of doing faith integration. Towards the conclusion of the seminar there was an exercise to identify a set of resources to continue faith integration development. I identified a list of resources and purchased numerous books on faith/learning integration, and faith in the workplace. One very formative book was Wayne Grudem's *Business for the Glory of God*. While I disagree with Grudem on some points, the main thrust of the book was impactful. It was this book that started me on a journey to think more theologically about business. After becoming aware of the Theology of Work project (<http://theologyofwork.org/>) another reference frame was developed to help consider business, work, and technology and how they intersect with scriptural principles. It was as a result of Grudem's book, the theology of work website, and a conversation with a fellow professor that I began reading the Bible with a specific lens to search for verses related to business, work, and later technology. This

approach is similar to what Chewning wrote in “The Testimony of Richard C. Chewning” when he described reading through the Bible and placing an “E” in the margin whenever coming across a verse having to do with economics or business. I went back to the Bible and began highlighting verses that seemed to speak directly or indirectly to technology and to business. Initially my thoughts on the Bible and technology grew out of random thoughts accumulated while considering the biblical record and searching my memory for verses and stories from the Bible that may shed light on technology. Over time I expanded my Bible study to include journaling regarding the verses that are technology or business related.

In 2008 I heard a talk by Shane Higgs on the impact of media on society. As a result of that talk I purchased and read Higgs book, *The Hidden Power of Electronic Culture: How Media Shapes Faith, the Gospel, and Church*. This book provided additional impetus for delving deeper into the scriptures and to read additional authors writing along the intersection of faith, technology, and society. *The Hidden Power of Electronic Culture* provides many helpful illustrations but I especially appreciated the definition of media/technology and the framework Higgs lays out (both will be shared later).

Around this time I started to ask my students the question “Provide examples of how the Bible discusses technology. Think outside of the box and outside of merely information technology like computers and the internet (I have not found them in the Bible yet not even with a biblegateway.com search).” It has been interesting to see the responses students come up with. Many will list verses on Noah’s ark, the tower of Babel, or weapons. However, others have expanded the list of verses applicable to this discussion by identifying verses I had not considered or had a different take on. Throughout the course the students continue to reflect on technology and spirituality by considering (1) how has technology helped facilitate your spiritual development? Give specific examples (at least two) that have been helpful. (2) How has technology hindered your spiritual development? Give specific examples (at least two). I also began using the Higgs book in an MBA class on Strategic Technology Management which has spawned interesting dialogue and debate. The students in both courses continue to provide very positive comments regarding how these questions and discussions have helped them to see the relevance of the Bible in new areas and to consider the impact of technology on their lives.

A TALE OF TWO WORDS: THE TECHNOLOGICAL CONTEXT

The Bible and Technology are two words you don’t often hear together; that is unless one is discussing how easy it is to look up Bible verses via biblegateway.com. When discussing technology and the Bible with students they often respond with a confused look on their faces. When asked to identify Bible verses related to technology many will indicate there aren’t any. Part of the problem may be because of the context. The students are typically asked this in an introduction to technology and applications class so they have an IT centric view of technology; that technology is computers, cell phones and TVs. Therefore their definition of technology is often too small. Their view of God may also be too small. Their response is occasionally “Technology is not something God would speak about – He is not interested in the mundane.”

While mundane is usually associated with being dull or lacking excitement it is also defined as “Of this earthly world rather than a heavenly or spiritual one.” (Merriam-Webster, 2003). God does have interest and involvement in both the spiritual and the earthly world. God has provided guidance in His Word that both describes and prescribes technological creation and usage. Many, if not most, people fail to realize that the Bible is replete with references concerning technology. The Bible itself is an example of a technology [written

communication] that has had significant impact on our culture and how we communicate (Higgs, 2006). Considering books as a form of technology is a concept often not understood. Most people do see the printing press as a technology. The printing press enabled mass production of written works which lowered the cost and allowed the printed words to get into the hands of more people. Yet, most people easily see the internet as a form of technology. In both cases [books and the internet] they are mediums to transmit ideas; they extend an individual's ability to communicate with a wider audience.

TECHNOLOGY DEFINED

Technology is defined as the systematic treatment of an art, the combination of logic and art/skill or as “the practical application of knowledge especially in a particular area.” (Merriam-Webster, 2003). While accurate this definition lacks helpfulness. Shane Higgs (2006) bases a definition from the subtitle of Marshall McLuhan's book *Understanding Media* when he states, “Every medium is an extension of our humanity. All forms of media (i.e., any human invention or technology) extend or amplify some part of ourselves.” (p. 34). Nicolas Carr (2010) also builds off McLuhan in a similar fashion indicating that “Every technology is an expression of human will.” (p. 44). Carr goes on to divide technologies into four categories: ones that extend our physical strength, our senses, our intellect, or ones that reshape nature. An example of this is how binoculars extend our sense of sight enabling us to see further.

These definitions provide additional clarity both from an epistemic viewpoint and also from a practical perspective. While Webster's definition allows one to identify an object as technology, McLuhan's definition includes a teleological component which helps one understand the intended purpose of the technology. Looking at technology from this perspective is the first step in seeing how one should be using or how one is currently misusing technologies. This provides the possible basis for taking back our lives and using technology effectively. From Higgs and Carr's definition it seems appropriate that one asks the question, is this technology extending my ability to do things and if not how could/should it? This assumes that the object in question is perceived as being useful in some regard.

THEOLOGY AND TECHNOLOGY

This section will consider the intersection of theology [reasoning about God] and technology. In *The Integration of Faith and Learning*, Robert Harris (2008) writes,

“The integration of faith and learning is not a strange, quaint, or unusual process, nor even one that is unique to Christianity. The integration of learning (or knowledge) is an activity performed by everyone who understands the need for a coherent worldview, by everyone who knows that believing conflicting claims is not reasonable.” (p. 1).

In *Religion/Technology, Not Theology/Science, As The Defining Dichotomy*, Roy (2002) says that “Technology is, without any doubt, the world's most powerful and fastest growing religion” (p. 667). When thinking of religion one could consider the definition “relating to or manifesting faithful devotion to an acknowledged ultimate reality or deity” (Merriam-Webster, 2003). A great number of people seem to be devoted to a technological deity while claiming that their allegiance is to Jesus Christ. It is my hope that this paper will help identify places where that may be true and provide strategies to reverse this trend.

While considering theology, culture, and hermeneutics Kevin Vanhoozer discusses the need for interpretation when he writes,

“It is part of theology’s task to discover and articulate the way of wisdom through the stage, and the stages of life with the Word of God-the ultimate set of stage directions... Those cast as theologians, like those given other parts, play the role of actor and critic simultaneously. Theology is an attempt to evaluate world performance by the criterion of the Word of God. Interpretation is doubly part of theological work: not only the Word but the world itself must be interpreted. (p. 309).

The following sections provide example interpretation of the Word and the world regarding technology.

BIBLICAL REVIEW

With a broader view of the definition of technology, a reading of the Bible results in thousands of references to technology. My study has indicated that there are over 800 technology related references in the Bible that start with the letter “A” (e.g. altar, ark, armor). To consider all the verses is well beyond the scope of this paper. This section will highlight key verses and consider the possible implications of these verses towards developing a theological basis for approaching technology. This section will cover the meta-narrative and technology; technology – In the beginning; metaphor and technology; technology, tools, and neutrality; technology and trust; technological idolatry and worship; technology and time; technology and Jesus; other Bible references; and finally technology and the cross.

BIBLICAL REVIEW: THE META-NARRATIVE AND TECHNOLOGY

The meta-narrative is the overarching story told through the Bible. When considering technology, a high level question one could ask is what is the progression from creation through restoration – from Genesis 1 to Revelation 22? The creation account begins with humanity in a garden. The last chapters of Revelation end with a new city coming down from Heaven. From garden to city; that seems like a form of progress indicating God is pro-progress, at least to some extent. While the old earth is destroyed (2 Peter 3:10-13), along with all of the technology, we do not return to a pre Genesis 3 garden but to a city. What does this mean for technology?

Another consideration of the meta-narrative is to reflect on how the biblical narrative (creation-fall-redemption-restoration) is often replicated at a micro level with each new technology. Each new technological conception includes aspects of the image of the creator being imbued in that creation. This creation may have been birthed out of love with the best intentions. Often it is not long before there is a Fall when the creation ends up being used for something outside of its original intent. Just as God elects His covenant people to be involved with the redemption of humanity, our role with regard to technological things should also be one of redemption. In the case of technology it is not typically the technological object that must be purchased out of slavery but our interaction with technology that needs redemption. The dictionary definition of restore is “to bring back to or put back into a former or original state” (Merriam-Webster, 2003). When something is restored in Scripture, it typically grows or multiplies so its final condition is superior to its original state (Joel 2:21-26; Exodus 22). So while worldly restoration may involve fixing that ’68 Mustang GT convertible so it runs like new (just like it did in 1968), biblical restoration should include an aspect of making that thing “very

good” again. While we can and should be involved in restoration, ultimately humanity is not able to achieve complete restoration, only God can.

BIBLICAL REVIEW: TECHNOLOGY IN THE BEGINNING

The theologian Julie Andrews [from the Sound of Music] was wise when she sang that the very beginning is a very good place to start. With that in mind Genesis has much to say regarding technology. While God’s creation of the universe ex nihilo [out of nothing] and his creation of man and woman imago dei [in His image] don’t directly speak about technology they do imply much about God and humanity. The creation “extends” glory to its Creator through the splendid majesty that is evident throughout creation. Also, as a result of the imago dei, creating is part of our nature and should be considered as a positive attribute. God’s creation mandate was to “Be fruitful and increase in number; fill the earth and subdue it. Rule over the fish of the sea and the birds of the air and over every living creature that moves on the ground.” (Genesis 1:28). In Genesis 2:15 Adam was placed in the garden to work it and care for it. The pre-fall purpose of humanity was to have dominion over the world. Our ability to create and use technologies to aid in this process is one of the attributes that distinguish us from animals. And yet, in their first creative act after they sinned, Adam and Eve put on fig leaves to cover themselves (Genesis 3:7). Clothes are a technology based on the earlier, expanded definition of technology. In an act of grace God provides an upgrade by fashioning clothes out of animal skins (Genesis 3:21). This act of grace points forward to the ultimate sacrifice of Christ. Clearly not everything humanity creates reflects God’s desires.

Another example of technology and God’s grace is Noah and flood (Gen 6-8). Here we see God providing specific instructions [to build an ark] that enable Noah to save his family and the animal kingdom. This is a positive example of technology. Creations of this nature glorify God and are to be commended. A short while later, in the Tower of Babel, we see a creation meant not to glorify God but “that we may make a name for ourselves” (Genesis 11:4). Here we see humanity using their creativity to build their way to God; to work their way towards God. It does not seem as though the Tower of Babel itself was evil but the intents of the hearts of the people building the tower were. It is also interesting that a second purpose for the building of the Tower of Babel was so they would not be scattered and the consequence for them creating the tower was that they were scattered. A critical concept to think about before creating or using technology is to consider the unintended consequences of that technology. This is the “what might happen?” question. Also interesting is that God confused their languages. Current day technology allows one to translate many of the popular languages on the fly via a specific device or with a smart phone. Is that reversal of what God did at Babel good or bad? Or is language translators consistent with what happened at Pentecost (Acts 2:6-12)?

BIBLICAL REVIEW: METAPHOR AND TECHNOLOGY

Technology is, at times, considered by Christians in a negative light. This is especially true when using technology becomes another way of conforming to the world (Romans 12:2). However, there is evidence in the Bible that technology is looked upon favorably by God. For example, Psalm 119:105 reads "Your word is a lamp unto my feet, and a light for my path." The lamp is a form of technology and if one views God’s Word in a positive light then the lamp should be taken positively as well.

Another example of technology as metaphor would be Ephesians 6 which talks about putting on the full armor of God. Each piece of armor describes a characteristic we are to model as Christians, and is used as an analogy of warfare technology. The Bible describes the LORD as a shield is in Psalm 3:3, "But you, LORD,

are a shield around me, my glory, the one who lifts my head high." Also in Hebrews 4:12 the Word of God is described as being sharper than a double edged sword. If the Bible uses technology as a metaphor for us to understand God better there must be at least some ways in which technology can be considered in a positive fashion.

BIBLICAL REVIEW: TECHNOLOGY, TOOLS, AND NEUTRALITY

"Technology...is a queer thing; it brings you great gifts with one hand, and it stabs you in the back with the other." —C.P. SNOW, quoted in New York Times

Tools were used to fashion the golden calf (Ex 32:4) and they were also used by Moses to carve out the stones that God used to write the 10 Commandments (Ex 34:4). Does this mean that technology is neutral such that if you are creating something good then the technology is good? One would think that the building of the temple and the altar is a good thing so tools used for those activities would be acceptable. And yet tools were forbidden onsite when building the temple and everything used was to be natural. This was done so that nothing would distract from the worship of God alone. It's interesting how in church today technology is used everywhere. The same command was given for building altars (Exodus 20:24-25; Deuteronomy 27:5; Joshua 8:31; Kings 6:7; Isaiah 44:12). Nothing should detract from the worship of God so clearly we should consider if and how our technology might be doing so.

The same tools can have different applications; they can be used for both war and peace, for good and for evil. The prophets Isaiah and Micah both looked to a future where people will beat their swords into plowshares and spears into pruning hooks (Isaiah 2:4, Micah 4:3) and yet Joel saw a time when the people would beat their plowshares into swords and pruning hooks into spears (Joel 3:10). So something intended for peaceful use may be applied for war and something useful for destruction may be re-applied for peaceful applications.

Tools are intended to be useful for their user and are not greater than its creator or the one that wields it; they are meant to be subservient to the wielder (Isaiah 10:15). This can also be seen by the relationship between a clay pot and the potter (Isaiah 29:16; Romans 9). However, the Bible indicates that the creator of or user of technology may be injured as a result of technology (Ecclesiastes 10:9). Deuteronomy 19:5 describes how an axe head might accidentally fly off and kill someone. In this case the person may flee to a city of refuge and live. This does not include poor workmanship or poor maintenance as can be seen by Deuteronomy 22:8 which instructs one to build a railing around their roof to prevent anyone from falling off. So while one is not guilty when accidents happen, one should work to prevent dangers that could result from the use of technology.

BIBLICAL REVIEW: TECHNOLOGY AND TRUST

Another key concept seen in multiple passages is the idea that one must put their trust in God and not in technology. This can be seen in verses that discuss horses and chariots where God limits their use so Israel will trust in God (Deuteronomy 17:16; 20:1 – 20; Psalms 20:7; Psalms 44; Isaiah 31:1). A great example of this is the story of David and Goliath (1 Samuel 17) which addresses the question, should one depend on bronze armor (technology) or trust in God? The people of Jericho seemed to put their trust in the large walls of the city (Joshua 2:15; 6:5-20). Obviously God is able to overcome any technology. These verses should move us

to ask the question, will this technology strengthen or weaken my trust in God? How can this technology best be used to strengthen ones trust in God?

BIBLICAL REVIEW: TECHNOLOGICAL IDOLATRY AND WORSHIP

“Machines are worshipped because they are beautiful, and valued because they confer power; they are hated because they are hideous, and loathed because they impose slavery.” (Russell, 1928, p. 64).

The Bible is replete with verses warning against idolatry (Exodus 20; Psalms 115:2, 8; Isaiah 40:18-20; 44:9-20). The impact of idolatry for Israel often resulted in slavery. While most individuals would not admit that they worship their cell phone, it seems clear that if a person from 1500 BC was transported to our time they would be intrigued by the idols that we carry on our belts or in our purses. In the book of Jonah, Jonah uses technology [a boat] to run from God (Jonah 1). God uses nature [a whale] to bring Jonah where He wanted him. Technology seems to have a proclivity to move us away from God while God's creation tends to move us to worship Him, to be in awe of His majesty and His splendor.

The Hebrew shēma' (Deuteronomy 6:4-9) commands one to “Love the LORD your God with all your heart and with all your soul and with all your strength.” This command is recounted numerous times in the new testament and is included in part of Jesus' answer regarding the most important commandment (Matthew 22:37, Mark 12:30, Luke 10:27). Jesus added to love the Lord your God with your entire mind. Using technology is one way of being a good steward of God's gift of intelligence. It is important that we don't let the benefits received from technology cause us to forget the Lord.

Likewise, Jesus says that we should not serve two masters, we love one and hate the other or vice versa (Matthew 6:24; Luke 16:13). Mammon can refer to wealth or property and both can be considered as a form of technology. Money “extends” our ability to trade and many possessions extend some function of leisure or productivity. In these verses, “mammon” is personified as a rival to God for the loyalty of the disciple. There are times when we can make technology a master in our lives by being consumed by TV, video games and the internet. To which master will obedience be given? How will the use of this technology positively and negatively impact my relationship with God? With myself? With neighbors, spouse, kids?

Paul commends believers to “do it all for the glory of God” (1 Corinthians 10:31); the verse says, "whatever you do" and using technology clearly is one of the things we do. Our use of technology, computers, and the internet should glorify God. In Romans 12:2 we are told by Paul to "Be not conformed." In what ways are you conformed more to the world's technological systems than to God's Word?

Technology also has the ability to connect us with God and to worship God in ways that are helpful to one's relationship with God. Musical instruments are found throughout scripture (1Samuel 18:6; 1 Chronicle 16:5; 2 Chronicle 29:26; Nehemiah 12:36) extending our ability to produce beautiful melodies. The use of electronic technologies has made it easier to study the Bible and to find numerous helpful supplements. Websites like biblegateway.com make it easy to find a specific verse. Of course, even a tool that can impact one's faith positively can also have negative consequences. Electronic and web based Bibles have made it so easy to find verses that Bible memorization has significantly decreased.

BIBLICAL REVIEW: TECHNOLOGY AND TIME

There are also verses that indicate we need to make the best use of our time (Colossians 4:5; Ephesians 5:16). While technology can improve productivity it can also be the source of our unproductiveness. We often assume that technology will help but in *Redeeming the Time*, Ryken writes, “One of the unexplained results of the technological revolution is that “time saving” devices have consumed our time instead of freeing it up.” (p. 38). Ryken goes on to describe from research that the amount of time spent on housework has remained constant even with the advent of numerous “time-saving” technologies. In Ecclesiastes we see that “There is a time for everything, and a season for every activity under heaven ... a time to tear down and a time to build (Ecclesiastes 3:1,3b). Even after determining that a technology may be useful one should still consider if now is the right time.

BIBLICAL REVIEW: TECHNOLOGY AND JESUS

Some of Jesus’ sayings have been included in other sections. Here I discuss verses that don’t fit in the other sections. Jesus seems to be comfortable using technology when doing so is a good fit for his mission. Jesus was a carpenter’s son – a τέκτων / tekton’s son (Mark 6:3; Matt 13:55); we get the word technology from the Greek tekton. We see that Jesus was willing to use technology when it was helpful in his use of a boat for travel and for speaking from (Mark 3:9). In Matthew 11:28-30 Jesus used the imagery of the yoke, a technology that allowed two or more animals to work effectively together, instructing people to take on his yoke because it is easy and light. A yoke can symbolize a burden, oppression, or a bond. In the Old Testament God occasionally broke the yoke that had enslaved Israel (Isaiah 9:4; 14:25; Jeremiah 2:20). In the New Testament it is used as a metaphor for submitting to Jesus and being connected to him. To what extent is technology a yoke, a burden that you need to get unshackled from? Is technology preventing you from being fully yoked with Christ?

BIBLICAL REVIEW: OTHER BIBLE REFERENCES

There are numerous other references to technology in the Bible including weapons (Judges 18:11-17; 2 Chronicle 23:10; Nehemiah 4:17), wagon (Gen 46:5), the Tabernacle (Ex 25-27), tablet’s with the 10 commandments (Ex 20), grain storage facilities used to minimize the effects of a famine (Genesis 41:47-49), and wells (Genesis 26; 29; John 4). In 2 John 1:12 John writes “I have much to write to you, but I do not want to use paper and ink. Instead, I hope to visit you and talk with you face to face, so that our joy may be complete.” We were created to be relational beings and that attribute seems to be best fulfilled when in direct contact with others not mediated via technology (paper and ink or Facebook, texting, and email). Each of these verses continues developing the biblical view of technology.

BIBLICAL REVIEW: TECHNOLOGY AND THE CROSS

In the book of Esther we see the hatred Haman has for the Jews in general and for Mordecai especially. Haman, at the instruction from his wife and friends, erects a 75 foot tall gallows for the purpose of hanging Mordecai. Due to the province of God and the actions of Queen Esther the king ends up hailing Mordecai as the hero Haman wanted to be and hanging Haman in the gallows intended for Mordecai. (Esther 5:14; 7:8-10). The Hebrew word for gallows can also be translated tree or wood. This event could be considered a type that looks forward to Christ. In the book of Esther the righteous was to be hanged and the unrighteous was put in his place. With Christ the righteous was hanged for the unrighteous (1 Peter 3:18). In both cases what is intended for evil was transformed for justice. The cross was an instrument to extend humanity’s ability to inflict pain (original intent). God transformed the intent of the cross by extending its ability to demonstrate

His love (God's intent). One of our key roles should be to consider how we can transform technology for the purpose of God's Kingdom. Our use of technology should be light and salt for this generation (Matthew 5:13-16).

THE MEDIUM AND THE MESSAGE

Marshall McLuhan (1998) popularized the notion that "the medium is the message." (p. 7) and later announces,

"I am in the position of Louis Pasteur telling doctors that their greatest enemy was quite invisible, and quite unrecognized by them. Our conventional response to all media, namely that it is how they are used that counts, is the numb stance of the technological idiot. For the "content" of a medium is like the juicy piece of meat carried by the burglar to distract the watchdog of the mind." (p. 18).

McLuhan asserts that content follows form such that each new medium [technology] has the potential to carry with it changes in the ways we think and feel. While at times it seems as though McLuhan overstates his case, such is the approach of many prophets. I don't agree that the medium "is" the message. However, it seems true that the medium shapes the message and has the power to shape us far greater than most of us have considered. Hipps (2006) attempts to show how print technology led to the development of modernity; that print caused individuals to think more individualistically, more objectively, more abstractly, and led to linear, rationalistic thinking. He also shows how the electronic culture has led to post-modernity, causing individuals to prefer emotion and experience, to see the validity of knowledge based on its interconnectedness [think web], and to reduce one's ability for critical thinking and abstract thought. While the idea that the creation of print media and the electronic culture necessarily directly led to modernity and post-modernity seems overstated, it is an interesting correlation that deserves consideration.

Every technology that is created contains a value system within it. There are the "as created" values that were intended, either intentionally or accidentally, by its creator and the "as used" values based on the ultimate use pattern of that technology. These two do not always match. An extreme example would be the mismatch between the creation of Sudafed to relieve symptoms of a cold and its use as a narcotic. In *The Shallows*, Carr (2010) shows the impact the internet is having on our mind, our ability to focus, and on memorization. It seems useful to consider how any given technology might shape us as individuals and as a society?

THE LAWS OF MEDIA: A USEFUL MICRO-FRAMEWORK

McLuhan also wrote on the laws of media in a book by the same name. Hipps (2006) summarizes and clarifies McLuhan's Laws of Media; essentially a set of questions designed to help identify the effects of any media / technology. These questions can be utilized as a micro-framework to consider the impact of any individual technology. The questions are: (1) what does the medium extend? (2) what does the medium make obsolete? (3) what does the medium retrieve? (4) what does the medium reverse into? Hipps applies this framework throughout the book to assess multiple technologies and to consider their impact on society. Hipps applies these questions to technologies like the surveillance camera, print, and electronic media. These questions can be useful to consider before making any technology purchase or to judge any technology currently in use.

CHRIST AND CULTURE: A USEFUL MACRO-FRAMEWORK

Niebuhr's *Christ and Culture* has significantly impacted how we as Christians should interact with culture. A key component of culture since the 1800's but especially in the late 20th century and early part of the 21st century is technology. To reapply Niebuhr's framework to the arena of Christ and technology could create the following five relational categories: (1) Christ against culture - Christ and technology in opposition. The stereotypical example of this would be the Amish. However, their response to technology is much more nuanced. Still the image is one of rejecting the creation and use of most forms of technology. (2) Christ of culture - Christ and technology in fundamental agreement. This is the way the vast majority of Americans think about faith and technology; basically accepting technology uncritically. (3) Christ above culture - Christ above technology by honoring that which is good while adding Christian faith, hope, and love to that inherent goodness. An example of this might include TV being ok if it dispenses the Gospel or educational content. (4) Christ and culture in paradox - Christ and technology in paradox. In this view both Christ and technology claim our loyalty and the tension between them cannot always be reconciled. (5) Christ transforming culture - Christ transforming technology. While technology has the potential to embody the values of Christ more often it does not. The Christian's role is to reorder these fallen areas and recast them to conform to God's desires.

While claiming that all five responses are valid it seemed that Niebuhr's preference was for Christ transforming culture. In the area of technology I operated in the Christ of technology approach most frequently until around five years ago. Since then I find myself operating in the Christ against technology, especially in my non use of certain social media and wireless technologies (even as a technology instructor or maybe due to being a technology instructor). Christ above technology is the approach I most often utilize in the areas of media (TV, movies, music). If I did stop to think theologically or critically about technology I often considered the two to be either a paradox or just two realms that were never to be considered together. I tend to agree with Niebuhr seeing all of the approaches valid at different times but find myself gravitating to the Christ transforming technology position first looking for ways to live in harmony with most technologies in a way that honors Christ and does not have negative unintended consequences on me and my relationships.

LITERATURE REVIEW: CHRIST, TECHNOLOGY, AND POWER

In an article in the *International Review of Mission*, Jacques Ellul (1977) calls for a complete change to the direction of technology. He indicates that technologies primary [only one] aim has been the multiplication of means of power. In Jesus we see an example of humility and the use of non-power. Even during his arrest, Jesus indicates that God could have used power but elects non-power. Ellul goes on to say,

“This choice of non-power (which goes well beyond the non-violent position) is the determinative point for the critique of technology. Does this mean the complete abandonment of technology? That direction would obviously be Utopian and impossible, but on the other hand so is the common idea that we only need to change our way of using technology, using it properly instead of badly. It is not a matter of the use to which technology is put: means directed exclusively to quantitative growth, complete efficiency and power, cannot serve non-power!” (p. 114).

From these comments a set of questions could be derived to determine the following: What type of power does this technology give? To whom? For what purpose? Should I participate? If not, what should my response be?

LITERATURE REVIEW: TECHNOLOGY, VIRTUE, AND SHALOM

While living virtuously is part of the subtitle of Quentin Shultze's (2002) book, it seems that shalom is a common theme that runs through much of it. Shalom is a wonderful biblical concept that goes beyond our conception of peace and includes completeness and a general sense that things are just as they are supposed to be. That contribution alone is a worthy addition to this paper and should lead one to ask the question how will using this technology increase shalom (for me, for my family, for my church, for society, for the Kingdom of God)? Additionally Shultze argues for moderation, wisdom, humility, authenticity, diversity, and organic community life. Questions and habits can be developed from each of these.

LITERATURE REVIEW: HISTORY OF TECHNOLOGY

“If there is technological advance without social advance, there is, almost automatically, an increase in human misery.” —MICHAEL HARRINGTON, *The Other America*

There are large multi-set volumes as well as large individual works that document technological history throughout time. *A Short History of Technology* is not so short at over 700 pages (Derry and Williams, 1960). In *Man the Maker*, Forbes (1950) documents the development of civilization and technology throughout history. Included is a section looking at technology and theology from 400 – 1500 AD. Forbes makes the case that the philosophy of the medieval civilization was based exclusively on Christian theology and that this philosophical grounding had a profound impact on science and technology. During this period science was meant to serve religion. In the post-medieval periods science and religion gradually came to be in opposition with one another. Science and technology became seen as part of the way humanity would be saved. After World War I and even more so after World War II this view became less popular.

In many of the books and articles reviewed it seemed that many approached technology with unbridled optimism (Derry and Williams, 1950) and numerous authors with a supreme skepticism, especially when looking at technology from a theological perspective (Mitchum & Grote, 1984; Schultze, 2002). In one article Mitchum & Grote state “Confidence in the progressive evolution of humankind has disappeared in the face of holocausts and the magnification of violence. The technological Garden of Eden has succumbed to a thousand doubts.” (p. 295). And yet the Christian scholar's task should be situated teleologically in the context of Christian hope (Jacobsen and Jacobsen, 2004).

PULLING IT ALL TOGETHER: WHAT THEN SHOULD WE DO?

So where does one go from here? How can the theological reflection, the models, and the cultural critiques of technology be synthesized into action steps one could take? A detailed answer to that question is beyond the scope of this paper but a brief summary next step will be outlined. While taking inventory of the existing technologies you are using or when considering creating or purchasing a new technology one should consider the expanded definition of technology provided and thus ask what will this extend? Also consider the other questions from Hipps' framework; what will it obsolete? What will it retrieve? What will it revert into? From a biblical perspective one should ask how will this technology help to love God better? To love my neighbor (spouse/ family) better? Consider how using the medium itself regardless of the content may shape your thinking. Depending on the technology and the individuals own makeup there may be other questions identified in this paper or from other sources that may be helpful. For example, it is usually a good idea to

search the internet for “security issues with XYZ technology.” After considering these questions one can feel better that a well informed decision has been made.

CONCLUSION

Hopefully this paper has provided much to think about. First, some thoughts on a possible approach to utilize, or to adapt for your own discipline, to deepen your own faith integration in the topics most relevant to your scholarship. Second, an example application of that approach that incorporated numerous Bible verses. Third, from those verses questions that could be considered when evaluating technologies. Fourth, a number of useful books and articles that may be helpful if technology is a passion you desire to develop more expertise in. Albert Borgmann (1998) wisely states that “since technology as a way of life is so pervasive, so well entrenched and so concealed in its quotidianity, Christians must meet the rule of technology with a deliberate and regular counter-practice... a radical theology of technology must finally become a practical theology, one that makes room and then makes way for a Christian practice.” (p. 320-321). It is my hope that this paper has provided the impetus and tools to develop a theologically based technological counter-practice that promotes loving God and your neighbor as yourself.

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