Outline:

Use selected on-line articles to explore current issues related to crypto currencies such as BitCoin. A focus for learning is: the underlying technologies, impacts on society, and impacts on the environment.

Objectives:

* C1.4 describe how electronic access to information influences our everyday lives.
* C2.1 describe the negative effects of computers and computer use on the environment.
* C3.1 describe legal and ethical issues related to the use of computers.

**Level 1: Cryptocurrencies & Blockchains**

Read the following resources before answering the questions below:

* <https://www.investopedia.com/tech/most-important-cryptocurrencies-other-than-bitcoin/>
* <https://www.investopedia.com/terms/b/blockchain.asp>
* <https://www.cryptoandgamers.com/>

1. What is a “cryptocurrency” and how are “cryptocurrencies” different from traditional currencies (money)?
2. BitCoin is the leading cryptocurrency that most people know. What are some other cryptocurrencies and what are their unique features?
3. “Blockchains” are the basic technology behind cryptocurrencies and other emerging technologies. Explain blockchains work with respect to:
   1. What they store
   2. How they work
   3. How they are secure and private
   4. How they use public and private encryption keys
4. How does BitCoin use blockchains?
5. What are some other real-world applications of blockchains?
6. What are some advantages and disadvantages of blockchains?
7. Blockchain based games are the latest development in the gaming industry. Research the topic “Crypto Games” (google) to answer the following questions.
   1. What are some interesting Crypto Games available for Android or iPhone?
   2. How are they different from conventional games?

**Level 2: Bitcoin & Society**

Read the following resources before answering the questions below:

* <https://www.cnet.com/how-to/what-is-bitcoin/>
* <https://www.independent.co.uk/life-style/gadgets-and-tech/news/bitcoin-price-fall-criminals-blockchain-anonymous-cryptocurrency-zcash-monero-dash-a8174716.html>
* <https://coincenter.org/link/why-ransomware-criminals-use-bitcoin-and-why-that-could-be-their-undoing>

1. Who created Bitcoin and who owns Bitcoin now?

Satoshi Nakampto is the founder of Bitcoin and owns it to this day

1. How is Bitcoin created and what is "Bitcoin Mining"?

To create Bitcoin you have to do a process called mining.  
Bitcoin mining means the miners uses a special software in which they solve equation and make Bitcoin currency in return.

1. Can you buy Bitcoin and what does it cost?  
   It is possible to buy bitcoin but the price is so high, (5,124.41), that most people rather not.
2. Why would you want to buy Bitcoin and what can you use it for?  
   Usually people buy bitcoin because they want to become rich (the price increase rapidly)  
   Bitcoin are used to buy things.
3. What are the risks of using Bitcoin?  
   The risks of using bitcoin are the price of bitcoin is not very stable it goes up and down all the time which may lead you to a financial loss, its open to Cyber thefts and frauds, you may lose your account password, some people hid blocks which could have an effect on real miners and finally you can’t use it in many places.
4. How much of Bitcoin business is related to criminal activity?  
   25 Percent of bitcoin users are involved in criminal activity.
5. What are some of the reasons why criminals use Bitcoin?  
   Criminal love how efficient bitcoins network is, hackers can easily watch the block chain to see who has paid on time and then target them, and the currency taken cannot properly be tracked until exchanged for local currency.
6. What are some of the disadvantages of Bitcoin when used for criminal activity?  
   Some of the disadvantages of Bitcoin when used for criminal activity are it could be tracked if government find out the number for the account and the criminal will eventually use the currency to make a purchase and could get tracked.
7. Many people dislike Bitcoin because they think it is only good for criminal activity.   
   Is this true? Write a supported opinion paragraph (SOP) to explain your position.

I personal don’t really agree with that stated because firstly, although there is a lot of criminal activity on Bitcoin at this time I believe that as the currency is more in us and develops it will be safe. Also there is more legal activity on bitcoin and honestly I think the benefits out way the problems. Finally, the government and the powerful miner are able to track some of the frauds and criminal activities. In conclusion I think Bitcoin is still a relevantly safe place to invest and make some money or other wise 2.9 million to 5.8 million people wouldn’t be users.

Guidelines for writing a supported opinion paragraph (SOP)

* <http://schools.peelschools.org/sec/fletchersmeadow/studentlife/OSSLTprep/Documents/Sample_%20Writing%20a%20Supported%20opinion%20paragraph.pdf>

<https://www.independent.co.uk/news/business/news/bitcoin-what-is-cryptocurrency-where-use-investment-dark-web-illegal-explained-value-exchange-rate-a8082491.html>

<https://www.bitcoinmining.com/>

<https://www.google.com/search?safe=strict&rlz=1C1GCEA_enCA837CA837&ei=w_VuXNX0CMTujwSw_bPYCQ&q=what+is+bitcoin+mining&oq=what+is+bitcoin+mining&gs_l=psy-ab.1.0.0i67j0l9.59925.71739..73559...1.0..0.132.2506.9j15......0....1..gws-wiz.....0..0i71j0i131j0i10.vrAeB5cMRrQ>

<https://en.wikipedia.org/wiki/Bitcoin>

<https://nypost.com/2017/12/16/the-person-who-created-bitcoin-remains-a-mystery/>

<https://bitcoin.org/en/faq>

<https://index.qz.com/1159850/the-creator-of-bitcoin-was-among-the-50-richest-people-in-the-world-this-weekend/>

<http://fortune.com/2018/01/03/bitcoin-buy-how-to-cryptocurrency/>

<https://www.forbes.com/sites/forbesfinancecouncil/2018/12/05/the-top-10-risks-of-bitcoin-investing-and-how-to-avoid-them/#27cde71e2407>

<https://bitcoinmagazine.com/articles/study-suggests-25-percent-bitcoin-users-are-associated-illegal-activity1/>

<https://coincenter.org/link/why-ransomware-criminals-use-bitcoin-and-why-that-could-be-their-undoing>

<https://www.quora.com/What-are-the-consequences-of-criminals-using-bitcoin>

**https://en.wikipedia.org/wiki/Bitcoin**

**Level 3: Bitcoin & The Environment**

t.b.d.