## **Project 5: Ethics**

This project was done by Harley Combest for CS-2334 on December 11th, 2020.

## I. Privacy in a Global Pandemic

1. Imagine you are a programmer working on this system. According to the ACM code of ethics, what are your responsibilities, other than honoring privacy and confidentiality? List three.

According to the ACM code of ethics, I also have the responsibilities of making sure the work done for the users is of a high quality, performing only in my areas of competence in finishing said work, and of helping the public to fully understand mentioned work.

2. There are other forms of data available on mobile phones that would be more useful for solving this problem. What is an example of this data? Why aren't we using it instead?

The location of users at any given moment is data that would be more useful for the purposes of contact tracing; however, to gather this data would be a flagrant violation of the user's sense of privacy and, thus, it is not used (at least not to the extent mentioned).

3. Consider if Bluetooth didn't exist, and less private data was the only information available. Assume also that use of this system would significantly slow the pandemic, saving many lives in the process. Should the algorithm be implemented anyway? List at least two ACM ethical principles that are relevant to your position.

Granting the claim that this system would significantly slow the pandemic and save many lives in the process, it should, nonetheless, not be implemented unless the users approve of the undertaking with full understanding of said undertaking. The principles of the ACM reflect this position when they state with ethics code 1.6 that "computing professionals should only use personal information for legitimate ends and without violating the rights of individuals and

groups" and, furthermore, by stating in ethics code 1.1 that "an essential aim of computing professionals is to minimize negative consequences of computing, including threats to health, safety, personal security, and privacy".

4. This begs several questions: which of these two approaches is more ethically correct? Should individual privacy be absolute, or should we forego individual freedom(s) to protect society as a whole? Is there a compromise that can be met between these two schools of thought? Summarize your opinion on this in a paragraph.

In any civilization (which has existed or is still existing) there is a series of compromises that sacrifices the personal liberties of the individual for the supposed "greater good" of the collective whole to perhaps tremendous benefit within the fleeting moments of a time caught in the clutches of some crisis. This is understandable. For it is in the nature of any being to flail about in search of an immediate cure to such a present injury, and indeed compromises may be initiated and last some time to the benefit of the being in need of care and that which is to provide it in this analogy. However, the costs (of giving away some part of those freedoms which are essential to maintaining the idea of individual sovereignty) always seem to outweigh the benefits of such an undertaking in the long run when one leaves a central power to take control of the terms of such a transaction. Individual privacy should thus be held as absolute as long as possible before it is inevitably overthrown and its remnants must be protected, at least in thought, long after. The Romans lasted thousands of years in a much harsher world before trading their freedom for bread and further comfort into their collapse. I say we should do the same but last longer.

#### II. 23andme

1. How is this different from the Bluetooth contact tracing? Give at least one ACM principle that wasn't represented in this company's actions.

While those who developed Bluetooth contact tracing made its users aware of its incentives and the scope it took in fulfilling them and what advantage they got in doing so, the folks at 23andme failed to do this to the same extent. They failed to respect the privacy of its users to an adequate extent and, thus, failed to represent the ACM principle held within ACM ethics code 1.1 which states that they should always "establish transparent policies and procedures that allow individuals to understand what data is being collected and how it is being used, to give informed consent for automatic data collection". It seems as though the thought of alerting the users of their lucrative dealings with pharmaceutical companies conveniently slipped the company's mind when it came to want the consent of users through full understanding.

2. 23andme has encoded DNA information in such a way that they can readily create a very accurate fingerprint of a person, and they control how that data is used. What are two ways this data could be used to advance society? In contrast, what are two ways this data could be abused to control society?

In terms of advancing society, this data could be used to catch wanted criminals (if said wanted criminals happened to have used 23andme) and, less realistically, it can also be used to break into the thumbprint protected data holder of any petty tyrant (if a petty dictator happened to have used 23andme).

In terms of this data being abused, this data could be used by the company itself to breach the private phones (including stock brokerages, bank accounts, etc. used on said phone) of anyone who

has used 23andme and uses thumbprint protected devices and it can also be used as a product for unscrupulous customers who might want access to that information.

3. In both of the above cases, user data is being employed to advance Humanity (maybe, it depends on the net consequences of either case). What is the difference between the two? Did 23andme act ethically? Give at least one example of actions that would have made 23andme act more ethically. Why do you think they didn't do it this way?

It differs from the contact tracing case because the company was not as transparent with how it was going to use the user's data. 23andme acted ethically if we compare their actions to the actions of the soviets who initiated The Holodomor but failed to do so adequately from the standpoint of the ethical framework of this discussion. They could have made their dealings with pharmaceutical companies more apparent, but they failed to do so, likely, to save face with the public using their product. For the purposes of profit or perhaps genuine intent for a corporate cause, it would be better to make consenting to giving away your private information towards the company's wishes appear to be something akin to a heroic act to be fully realized by said company than just another ploy for financial advancement.

4. Considering all the information we have seen so far, who owns user data? As a software developer, you likely will have access to customer information, and you are obligated to protect that user data from unethical use; how can you help ensure that your team is acting ethically? How can you help ensure that your company is acting ethically?

The user owns user data for the time being. I can ensure my team is acting ethically by, first and foremost, acting ethically and, second, punishing unethical behavior by reporting it to the proper authorities. The same goes for the company I'm involved in: I will not partake in

the corruption and appeal to some higher authority to punish those that do.

# III. Ethics in the Workplace

1. Give two ethical principles from the ACM Code of Ethics that are relevant to this scenario. Explain why you think they are relevant.

One ethical principal that is clearly relevant to this scenario is the principle of respecting privacy. In ethics code 1.6 it states that "a computing professional should become conversant in the various definitions and forms of privacy and should understand the rights and responsibilities associated with the collection and use of personal information". Bob is acting along the lines of "I'm just following orders" and not really trying to understand what privacy concerns his actions on the part of the company may imply. He doesn't question why corporate is making the application track users after its closed or if that decision is being carried out in any manner that's transparent or ethical to the public. I think one should be a bit less sanguine about the use of the data that rightfully belongs to the users (although to be fair Alice isn't paying much attention either).

Another ethical principal that is relevant to this scenario is the principle of contributing to society and to human well-being, acknowledging that all people are stakeholder in computing. This is relevant to the present case because within ethics code 1.1 it states that computing professionals have an obligation to "protecting each individual's right to autonomy". The individuals using this application seem to have lost the right to govern a part of themselves when Gaggle uses their data without making it explicit that they're doing so and the purpose behind why they're doing so to a lucid enough level to be understood and remembered by its workers.

2. For each principle chosen for the previous question, say whether you think Alice abided by the principle. How did you come to that conclusion?

I don't think Alice abided by either principle. She simply asked one question (and that was more out of a concern for battery life than anything else) and carried on with her work without a concern in the world for the well being of the people her company supposedly serves.

3. What person or group of people would likely benefit from Alice's actions and why? What person or group of people would likely be harmed from Alice's actions?

The corporate board of Gaggle would likely benefit from these actions. The data gathered from their app can be used to better grasp the preferences of users and, thus, be better used for advertisements and, therein, profits.

The users would likely be harmed from these actions. They have given Gaggle the ability to know the going of their day to day life, most likely, without realizing it and this is a tremendous blow to their individual autonomy.

# 4. What is a likely motivation for Alice's actions?

Alice wants to work. She may not have even considered the privacy problems her actions implied judging by the fact that it appears that she only asked about the location tracking because it could drain batteries faster. She doesn't have a motive that is out of any malice. She simply wants to develop the part of the app that she is responsible for developing in a manner that is efficient and useful.

# IV. Open Discussion on The Media's Hunter Biden Conundrum (<a href="https://www.nytimes.com/2020/10/27/opinion/hunter-biden-story-media.html">https://www.nytimes.com/2020/10/27/opinion/hunter-biden-story-media.html</a>)

# 1. Summarize your ethical problem in a paragraph.

Social media platforms deliberately suppressed the Hunter Biden story posited by The New York Post without credence to established rules. Twitter says that they did so because it violated their hacked material policy. They stated: "In line with our Hacked Materials Policy, as well as our approach to blocking URLs, we are taking action to block any links to or images of the material in question on Twitter." However, the laptop left by Hunter Biden clearly belonged to the laptop repair store owner due to a contract which he and Hunter Biden both signed (and the receipts to prove it) who turned it into the FBI and, thus, did not violate their policy to any extent greater than the Trump tax leaks did. Facebook claims that it did so as well under similar claims despite allowing stories of less veracity on their site that targeted members of the other side of the political isle continue to remain unsuppressed.

# 2. List at least two ACM principles that are relevant to this dilemma. Are these principles being followed? Why or why not?

The ACM principle of being fair and taking action not to discriminate is relevant to this dilemma because the social media companies acted in a manner that indicated they suppressed a story solely based on the presupposed political beliefs of those who published it. This goes against ACM ethics code which states that "prejudicial discrimination on the basis of age, color, disability, ethnicity, family status, gender identity, labor union membership, military status, nationality, race, religion or belief, sex, sexual orientation, or any other inappropriate factor is an explicit violation of the Code."

The ACM principle of being honest and trustworthy is also relevant to this dilemma because the social media companies in accordance with their agreement to abide by Section 230 of The Communications Decency Act were to act as platform and not independent publishers but have clearly acted as the latter. ACM ethics code 1.3 was violated here as it states that individuals of these corporations "should be forthright about any circumstances that might lead to either real or perceived conflicts of interest or otherwise tend to undermine the independence of their judgment. Furthermore, commitments should be honored."

3. You are given the opportunity to interview someone closely involved in this situation, but you can only ask 3 questions. What questions would you choose? Why are these the most important?

First, I would ask them why the companies involved suppressed the Hunter Biden story and not the Trump tax leaks. Second, I would ask them why or why they don't think that the political opinions of those in the companies could be a conflict of interest in their present case. Third, I would ask them to what extent they believe actions of the companies involved affected the 2020 election. I would ask these questions because I want to see if they can put up a more viable case than the case which they currently have and, if it is indeed the case that they are discriminating on the basis of beliefs, I want them to admit it to themselves and to the public at large so that further discrimination can be prevented.