

## Ethics of the Actions Following the Discovery of a Bug on InstaToonz

The central ethical question of this scenario is whether we have a responsibility to report the bug to InstaToonz, given the possible negative consequences of reporting the bug. This ethical question must consider the potential legal consequences (among the other possible consequences) of our actions, depending on whether or not we are violating the DMCA. InstaToonz has a history of suing bug reporters despite benevolent intentions. We noticed poor security in the system and do not intend to act maliciously, but instead want to help protect their customers. So the question is: *what do we do?*

To address this question, we should consider the rights of all the stakeholders involved. We have a right to use the service that InstaToonz provides. We did not intend on finding the bug, so unintentionally coming across it would not be illegal, provided that it does not pertain to encryption of copy-protection. This is also true because our intentions include honest and private disclosure of the bug to InstaToonz immediately without sharing the information to others or using the bug maliciously. If the bug does pertain to encryption of copy-protection, it is possible that we, in a legal sense, are in violation of Section 1201 of the DMCA, even if from an ethical standard, our efforts to protect the privacy of InstaToonz users is still admirable.

InstaToonz clearly has a right to keep their data protected. They have the right to conduct their business in the way they want (within the extent of the law), but more importantly, they have a responsibility to their customers to keep their data secure -- especially the private messages their users expect to be kept private (which is a right the users have). If the bug pertained to the encryption of copy-protection, they have a clear right to sue under the terms of

Section 1201 of the DMCA. Even if the bug is outside of Section 1201 of the DMCA, InstaToonz may apply their terms and conditions of service as they wish - which might extend to prohibitions on bug finding.

We had assumed that we came across the bug unintentionally, but if we hadn't, the legal ramifications would be different. This information is missing from the scenario and would better help us assess the situation (even though we are making an assumption for it). If we had not "just come across it" and instead found it intentionally, we might be exempt from Section 1201 of the DMCA due to conducting security research - however, the carveout is narrow and quite possibly could not apply depending on legal interpretation. This isn't necessarily information missing from the scenario, but we would like to explore options of whether or not we could disclose the bug anonymously especially since InstaToonz does not have a bug bounty program.

The first possible action is no action. We could simply do nothing and move on with our lives. This would save us legal trouble, but the guilt would eat us alive. We know that users' privacies are at risk. If we want to take action, one option would be to contact InstaToonz and provide an honest, fair disclosure of the bug and how it was found. Another option, if possible, would be to disclose the bug anonymously to InstaToonz. Since we do not know if this is possible, we will skip over it. We could also disclose the bug anonymously to a third party such as a newspaper. The benefits of this would be avoiding personal legal battles. On the other hand, the third party could deal with this information maliciously. They could also do damage unintentionally. For example, news of the bug could leak, or it could be published instead of reported.

If we disclose the bug to InstaToonz directly (not anonymously), InstaToonz would likely sue us regardless of whether the bug pertained to encryption or copy-protection. While we might

win the legal fight against InstaToonz (either due to DMCA exemptions or lack of applicability of the DMCA to the situation at all) , even frivolous lawsuits brought by large companies against individuals can prove destructive and costly.

The ACM Code of Ethics and Professional Conduct provides guidance in the decision. We've already mentioned that we would disclose the information honestly and fairly. Disclosing the bug to a third party could be a violation of the code, since we cannot confirm benevolent intentions of the third party, and might risk some party exploiting the bug. We would not be respecting privacy. In order to avoid harm, the code of ethics suggests we have a responsibility to ensure the private disclosure of the bug to InstaToonz so that they can protect the privacy of their users.

Therefore, our recommended (and ideal) action is to honestly, fairly, and immediately disclose the bug to InstaToonz *anonymously*. This would be the best situation for all stakeholders involved: InstaToonz can fix the bug, we can avoid legal trouble if InstaToonz were to retaliate, and the privacy of the users would be protected. If that option is not possible, we would recommend disclosing the bug to InstaToonz anyway, but contacting legal counsel (like the ACLU) to prepare for a possible lawsuit and FBI investigation. Regardless of whether the bug is encryption or copy-protection related, we would need to be prepared for a legal and publicity fight. Given that InstaToonz backed down previously in the face of public backlash, it would be beneficial to our own wellbeing to have a plan to generate public backing for our disclosure - the backlash against InstaToonz might precede the actual legal standing of their case.