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CS-302 Problem Set 5
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Death is a Preferable Alternative to Communism

Here's how we solved the hunt:

0. We wrote the program, and got a bitstring as follows:
11111001 10001001 11101011 00001111 11110100 11110000 00011001 (program attached)

1. We used this as a key for the DES program, getting the message:
golookforaclue/in712/ithappenstobe/inonelessthantwo
1.1 Using this, we went to room 712 in SH1, where a message was posted on the door:
To proceed, remember the very second clue. For the level after, do your reading. That is the protocol (drop the s, all small).
1.2 We solved the second cryptographic puzzle in pset2, with the answer of 'shannon'. This led us to level 2.

2. We used the key 'kerbero' to decrypt the given bitstring via DES, where we got a clue to look for:
A big red pole between two academic blocks (paraphrased)
2.1 Once there, we received a clue to:
Find the important bits (paraphrased)
2.2 Using that, we took the first bit of each byte in the input, taking us to the next round.

3. We used the caeser cipher on the ciphertext, giving us a message in frnech:
Wrong path (translated)
3.1 We then filled out the feedback form, where we got a key before the submit button:
xxDvvDxxDvvD
3.2 We entered this, and reach level 4.

4. We broke the Vigenere cipher with the key 'ending'. We placed a note in the drawer in SH1, and then entered the answer:
hard.

And that's all, folks.