## Collin Chau

1. Suppose you know the following message was enciphered with Hill (2 dimensions with mod 29):

WP GY !T GQ MI

Break it knowing the first word of the message is "march".

- 2. Encipher the message "You should be a math major" using Playfair system with key work "steeped."
- 3. Decipher the message:

MC WG CM OT SW IC IF OU HK VH

using the Playfair system with key work "courage."

4. Encipher the following Charles Dickens quote

"To conceal anything from those to whom I am attached, is not in my nature. I can never close my lips where I have opened my heart."

using rectangular transposition with key word *rights*.

5. Decipher the following message

PYNCC ESALT YYOOT SCAEE NEAME SETSC NRBDO HTTDI HTDTM HETNE IENNO OLAPT MSLKI VMCEI HYPLH THKEH ARSBU MWUAD ROEOR NMAWW AKIHO EUI

knowing it was encipher with rectangular transposition with key word *contact*. Make sure restore spacing between words, capitalization and add punctuation to make it readable.

6. Look on the website for homecoming events at USD. Choose an event that you would be most likely to attend and write that down. I won't make you actually go to the event but consider doing it, it builds school spirit.