Assignment 2

This is a graded assignment

. . .

Points: **120/140**

1. Following is a Vigenere Cipher output. It is known that the key length is 12. Find the key written in lower case Latin (English) letters. All character are in lower case. No space.

jcuaglxpwhvjyovitkktebrkgflkntvycdkmifdxukkdlcnmtyhlbtmoirvqkuqwsibwlsiqchljzogpxwrrkbj zryxhvqyrjowkhrfprokcfwqbukwlzscmrahvguyalsuyvohvpxrwxwfluhdvqgkkhsjgphkmfzalwhis ehxzrallhwebggfiyrxketvguhhtakmdsfbguqruzugscijcfwquntripctiewsprxl

(20/20 Points)

codingtheory ✓

2. Following is a Vigenere Cipher output. It is known that the key length is 5. Find the key written in lower case Latin (English) letters. All character are in lower case. No space.

zhrjlxxijlwewrkszeiesgadwjbcrfukyglgzrrhzxrnzgpoicwwoelzxdvkaznfxubpywjlakatfiealbakafz rvkwtrtzlaakumemzfsmeuafmhvvwoecghfeelgytywvttrwfvrphlboekltnusjwdvkagtywkmhvklkutl mkelkwwievwlcrddxdrxwbskwdgekogkkzkuhmdgfeylkwwieesgysdgvktahaeik

(20/20 Points)

stars ✓

3. Encrypted text using the Vigenere cipher:

hswcbinkocjstbwxjitzwxoitaoxgepraydifhcdpiwbwdmhuhodmwfifsvkycfvlacfwspiyogzteesrev
hgfvycwgofbmwvpidoekbsncwewhshipgvsxxjstytpqkwxohcmvoeeuufkvxgrocmgwfwdggnsob
iresoxlfguoxestytyzxjsicimttcbkieoalzmfusbmwgofmpggbhozspwrovxktwmixkcbpzmgbryzjqsr
odmesgrmacggejwgeiovxnmswxpqmsnixowhctmpqcvvpcpcbixqfmdpiphvoumvfsmwvrcfkbm
qbtsvenzmrmqqjsnbskpagpitsvozieswfmhcbogivftcbpmuqfixxqufkxlkqkyzojwgbmwgofmpev
wpwtifhcdpifsjotsrasxbshhvotyewtozeprrkbegbqbgtvwcxaxcbrkzhewdrmvutssaxgzkkaspscp
blgsobtmgghxwricjozrosbdziusobklgfgdwwviriblgrscqkpobnblgcfiwjdzcmsgkdvozw

Find the key length.
(20/20 Points)

6 ✓

4. Encrypted text using the Vigenere cipher:

hswcbinkocjstbwxjitzwxoitaoxgepraydifhcdpiwbwdmhuhodmwfifsvkycfvlacfwspiyogzteesrev
hgfvycwgofbmwvpidoekbsncwewhshipgvsxxjstytpqkwxohcmvoeeuufkvxgrocmgwfwdggnsob
iresoxlfguoxestytyzxjsicimttcbkieoalzmfusbmwgofmpggbhozspwrovxktwmixkcbpzmgbryzjqsr
odmesgrmacggejwgeiovxnmswxpqmsnixowhctmpqcvvpcpcbixqfmdpiphvoumvfsmwvrcfkbm
qbtsvenzmrmqqjsnbskpagpitsvozieswfmhcbogivftcbpmuqfixxqufkxlkqkyzojwgbmwgofmpev
wpwtifhcdpifsjotsrasxbshhvotyewtozeprrkbegbqbgtvwcxaxcbrkzhewdrmvutssaxgzkkaspscp
blgsobtmgghxwricjozrosbdziusobklgfgdwwviriblgrscqkpobnblgcfiwjdzcmsgkdvozw

Find the key.
(20/20 Points)

cookie ✓

5. Encrypted text using the Vigenere cipher:

hswcbinkocjstbwxjitzwxoitaoxgepraydifhcdpiwbwdmhuhodmwfifsvkycfvlacfwspiyogzteesrev
hgfvycwgofbmwvpidoekbsncwewhshipgvsxxjstytpqkwxohcmvoeeuufkvxgrocmgwfwdggnsob
iresoxlfguoxestytyzxjsicimttcbkieoalzmfusbmwgofmpggbhozspwrovxktwmixkcbpzmgbryzjqsr
odmesgrmacggejwgeiovxnmswxpqmsnixowhctmpqcvvpcpcbixqfmdpiphvoumvfsmwvrcfkbm
qbtsvenzmrmqqjsnbskpagpitsvozieswfmhcbogivftcbpmuqfixxqufkxlkqkyzojwgbmwgofmpev
wpwtifhcdpifsjotsrasxbshhvotyewtozeprrkbegbqbgtvwcxaxcbrkzhewdrmvutssaxgzkkaspscp
blgsobtmgghxwricjozrosbdziusobklgfgdwwviriblgrscqkpobnblgcfiwjdzcmsgkdvozw

Find the plaintext: lower case without space.
(20/20 Points)

feistelwasborninberlingermanyandmovedtotheunitedstatesduringworldwariihewasplacedunderhousearres ✓

6. Find the index of coincidence of a language whose alphabet is {a, b, c, d, e} where the
probability of occurrence of
prob[a] = 0.2
prob[b] = 0.3
prob[c] = 0.2
prob[d] = 0.1
prob[e] = 0.2

Find the Index of Coincidence up to two decimal places. Enter in the form 0.**

(20/20 Points)

0.22 ✓

7. Question
(-/20 Points)

Enter your answer

Go back to thank you page