Problem 1: Women are denoted A, B, C, D and men are denoted a, b, c, d. The content of the box (a, B), which is (4,1), means that man a ranks woman B as his *fourth* choice and woman B ranks man a as her *first* choice. Find the men most preferred matching and the women most preferred matching for the following preference table. What can you say about the set of stable matchings?

	A	B	C	D
a	(1,1)	(4,1)	(3,1)	(2,1)
b	(4,3)	(3,2)	(2,2)	(1,3)
c	(4,2)	(1,3)	(3,3)	(2,2)
d	(2,4)	(1,4)	(4,4)	(3,4)

Problem 2: Find the set of stable matchings for the following table of preferences:

	A	B	C	D
a	(1,1)	(2,3)	(4,4)	(3,1)
b	(4,3)	(3,2)	(1,3)	(2,2)
c	(4,2)	(2,4)	(3,2)	(1,4)
d	(2,4)	(4,1)	(3,1)	(1,3)

Problem 3: How many stable matchings are there in the following matching problem?

A:	b $\succ$	e $\succ$	c $\succ$	d $\succ$	a	a:	D $\succ$	B $\succ$	C $\succ$	E $\succ$ A
B:	d $\succ$	b $\succ$	e $\succ$	c $\succ$	a	b:	E $\succ$	D $\succ$	A $\succ$	B $\succ$ C
C:	e $\succ$	a $\succ$	d $\succ$	c $\succ$	b	c:	C $\succ$	A $\succ$	D $\succ$	E $\succ$ B
D:	c $\succ$	d $\succ$	b $\succ$	e $\succ$	a	d:	E $\succ$	B $\succ$	D $\succ$	C $\succ$ A
E:	c $\succ$	a $\succ$	d $\succ$	b $\succ$	e	e:	B $\succ$	A $\succ$	C $\succ$	E $\succ$ D