## Quiz 5

1. Consider the following example for questions (a)-(g).

| 2 | 2 | 1 | 1 |
| :---: | :---: | :---: | :---: |
| $B$ | $C$ | $A$ | $D$ |
| $A$ | $A$ | $D$ | $B$ |
| $C$ | $B$ | $B$ | $A$ |
| $D$ | $D$ | $C$ | $C$ |


(a) What is the Smith set for this example? (1 pt) $\qquad$
(b) Who is/are the winners for plurality? (1 pt) $\qquad$
(c) Does this preference schedule serve as a counterexample to the following claim:

Claim: Plurality is Smith fair.
(2 pts) Circle one Yes No Explain briefly:
(d) Who wins by Runoff in this example? (1 pt)
$W_{R}=\{$ $\qquad$
(e) Is $B$ a weak spoiler for Runoff? (1 pt) Circle one: Yes No
(f) Is $C$ a weak spoiler for Runoff? (1 pt) Circle one: Yes No
(g) Is $D$ a weak spoiler for Runoff? (1 pt) Circle one: Yes No
2. Prove: If $C$ is a Condorcet candidate then the Smith set is $S=\{C\}$. Write all definitions. (2 pts)

PLEASE WRITE YOUR NAME ON THE BOTTOM OF THIS PAGE

Name:

