

Lesson 4 Weld Defects Quiz (option 1) Answer Key

1. What is the term for gas pockets formed in a weld bead?
 - a. Spatter
 - b. Porosity**
 - c. Arc Strike
 - d. Undercut

2. Convexity can only be part of what type of welds?
 - a. Groove welds
 - b. Fillet Welds**
 - c. Butt Joints
 - d. Pipe Welding

3. Slag can happen with what type of welding process?
 - a. GMAW
 - b. GTAW
 - c. SMAW**
 - d. MIG

4. Lack of Fusion can happen when:
 - a. Travel Speed is too fast**
 - b. Too high wire feed speed
 - c. Too many passes in a multi-pass weld
 - d. Travel Speed is too slow

5. What is the term for small particles of weld metal adhered to the base metal?
 - a. Spatter**
 - b. Porosity
 - c. Fusion
 - d. Undercut



6. What is the term for excessive throat in a fillet weld bead?
 - a. Excessive reinforcement
 - b. Insufficient reinforcement
 - c. Concavity
 - d. Convexity
7. What is the term for lack of sufficient weld metal build up in a groove weld?
 - a. Excessive reinforcement
 - b. Insufficient reinforcement
 - c. Concavity
 - d. Convexity
8. What is it called when the weld metal does not extend deep enough into the root?
 - a. Excessive concavity
 - b. Insufficient reinforcement
 - c. Lack of fusion
 - d. Slag Inclusion
9. What causes porosity?
 - a. Cooling too fast
 - b. Contaminated base metal
 - c. Slow travel speed
 - d. High amperage
10. What is NOT a cause of excessive spatter?
 - a. Improper settings
 - b. Long arc length
 - c. Contaminated base metal
 - d. Cooling too fast
11. What can be done to reduce/stop Arc Strike?
 - a. Weld over your arc strikes
 - b. Practice on the same base metal you are going to weld on
 - c. Only strike an arc in the welding zone
 - d. Using the tapping method when striking your arc



12. Undercut on one toe of the weld bead and overlap on the other toe is a result of what?
- a. Improper settings
 - b. Improper travel angle
 - c. Improper work angle
 - d. Improper travel speed
13. Which of the following does NOT cause overlap?
- a. Fast travel speed
 - b. Slow travel speed
 - c. High wire feed speed
 - d. Improper work angle
14. Which of the following is a cause for excessive reinforcement?
- a. Fast travel speed
 - b. Slow travel speed
 - c. Low wire feed speed
 - d. Improper work angle
15. What is Lack of Fusion?
- a. When the weld metal forms gas pockets
 - b. When the weld metal does not extend far enough into the root
 - c. When the weld metal lacks build up above the base metal
 - d. When the weld metal does not obtain coalescence with the base metal



Lesson 4 - Weld Defects Quiz (option 1) – Weld Defects Model Identification Answer Key

Look at each Weld Defects model carefully and then using the word bank, match each weld defect using the number on the bottom of each defect to the name of that defect on your exam sheet.

WORD BANK

Arc Strike	Slag Inclusions	Insufficient Reinforcement
Concavity	Spatter	Convexity
Excessive Reinforcement	Inconsistency	Porosity
Quality Weld	Overlap	
Undercut	Lack of Fusion	

1. Quality Weld
2. Undercut
3. Overlap
4. Lack of Fusion
5. Inconsistency
6. Spatter
7. Slag Inclusion
8. Concavity
9. Convexity
10. Insufficient Reinforcement
11. Excessive Reinforcement
12. Porosity
13. Arc Strike

