

EXERCISE COMPLETION EQUIPMENT 3

1. A straddle packer is being run because we have a tubing leak. However, the straddle packer is not holding any pressure. What is the correct action to take?
 - a) Run another straddle packer above
 - b) Pull out and run a 'back-up' straddle packer
 - c) Kill the well by bull heading
 - d) Close the down hole safety valve

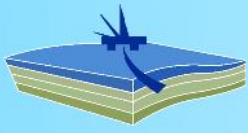
2. The Xmas tree has to be changed out. Which of the following is the correct sequence to ensure safe operations?
 - a) Kill the well – unseat packer – circulate – change tree
 - b) Set plug at the bottom tubing – pump killing fluid – set plug above – change tree
 - c) Set plug at the bottom – kill well by reverse circulation – set plug at tubing hanger – change tree

3. Which of the following is a correct definition of 'barrier' requirements in a completed well?
 - a) We must have a Primary, Secondary and Tertiary ENVELOPE
 - b) We must have at least 1 x primary and 1 x secondary BARRIER
 - c) We must have at least 2 independent barriers for any work activity
 - d) We must have a Primary, Secondary and Tertiary ELEMENT

4. You are pulling a retrievable packer with 40,000 lbs overpull and witness a surge in pressure, possibly from swabbing. How can this potential swabbing effect be reduced?
 - a) After unseating the packer, let it 'hang' for 1 hour or more without movement to allow packer element to relax and retract
 - b) Pick up & go down approximately 10 ft. before attempting to pull out of hole
 - c) Forward circulation around the packer to retract element before pulling
 - d) Run further into the hole as deep as possible before pulling

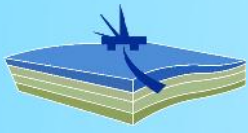
5. What are the main advantages of having production packers in well completions? (TWO ANSWERS)
 - a) It isolates the inner annulus [between casing & tubing] from the tubing string
 - b) It anchors the tubing string
 - c) It suspends the tubing string
 - d) It prevents well fluids and treatment fluids entering the outer annulus [between casing & formation or casing & casing]





6. The well is filled with 8.6 ppg. density fluid. The formation fracture gradient is 0.847 psi/ft and the well depth is 10,000 ft. (TVD). Calculate the Maximum Allowable Surface Pressure (MASP).
- a) 1,000 psi
 - b) 3,000 psi
 - c) 4,000 psi
 - d) 5,000 psi
7. When pressure testing a barrier, what should be avoided when the pressure test involves a deep positive plug?
- a) Do not allow differential pressure to exceed the string collapse pressure during bleeding off.
 - b) Do not allow different pressure to exceed the string burst pressure during bleeding off.
8. When run a completion string, how can we ensure that the tubing is made up correctly and then documented properly?
- a) By using a casing tong
 - b) By using the iron roughneck
 - c) By using a casing tong with computerized torque record
 - d) By using a rig tong and the rotary table
9. We plan to complete a well and run the completion tubing with a drilling rig. Which of the following statements are correct? (TWO ANSWERS)
- a) The cemented casing well bore with rig BOPs is sufficient for well barriers without using overbalance fluid.
 - b) The well must have a minimum of two barriers.
 - c) Tubing conveyed guns can not be run if there is no heavy mud.
 - d) All procedures must be followed in accordance with drilling and service contractor plans and the available equipment.
10. Where is the position of the seat in relation to a two-way check valve plunger?
- a) Above
 - b) Below
 - c) Above and below





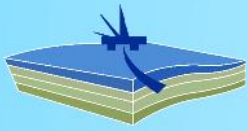
11. What type of closure mechanism can be fitted to the 'surface controlled' Wireline Retrievable Down-Hole Safety Valve? (TWO ANSWERS)

- a) Ball
- b) Flapper
- c) Orifice
- d) Gate

12. What type of closure mechanism that can be fitted to the TRSV?

- a) Ball
- b) Flapper
- c) Orifice
- d) Gate





EXERCISE COMPLETION EQUIPMENT-3

1.	b
2.	c
3.	c
4.	a
5.	a, b
6.	c
7.	a
8.	c
9.	b, d
10.	c
11.	a, b
12.	b

EXERCISE COMPLETION EQUIPMENT-4

1.	b
2.	c
3.	a, c, e
4.	c, d, g
5.	b, d
6.	c
7.	d
8.	b
9.	a, b
10.	b
11.	a, c
12.	b
13.	a, d
14.	a
15.	a, d
16.	a
17.	c

