

Advanced Circus Arts and Performance Theory

Circus Arts · Answer Key · 20 Questions

1. Which of the following describes the 'cradle' apparatus in aerial circus arts?

- A) A static horizontal bar used for hand-to-hand acrobatics
- B) A suspended framework used by a flyer to be caught by a porter**
- C) A harness system for vertical rope climbing
- D) A kinetic sculpture used for rhythmic floor work

2. In biomechanics, what is the 'centre of gravity' adjustment required for a performer executing a back somersault in a tuck position?

- A) The body mass must shift to the distal ends of the limbs
- B) The radius of rotation must be decreased to increase angular velocity**
- C) The performer must extend the arms to increase the moment of inertia
- D) The performer must remain rigid to maintain a linear trajectory

3. Who is credited with inventing the modern circus ring's standard diameter of 42 feet (13 meters) to accommodate horses at a canter?

- A) Philip Astley**
- B) Jean-Baptiste Auriol
- C) Jules Léotard
- D) Giuseppe Chiarini

4. What is the primary function of the 'swivel' in aerial rigging?

- A) To increase the static load capacity of the anchor point
- B) To allow the apparatus to rotate without twisting the suspension line**
- C) To provide a secondary safety brake in case of hardware failure
- D) To measure the tension force applied during dynamic movements

5. Which term refers to the 'hand-to-hand' circus discipline where a base supports a flyer primarily using grip strength and shoulder stability?

- A) Icarian games
- B) Adagio**
- C) Tumbling
- D) Contortion

6. In Chinese pole acrobatics, what is the 'flag' movement defined by?

- A) A rapid vertical climb using only the forearms
- B) A horizontal position held perpendicular to the pole**
- C) A seated balance atop the pole base
- D) A backflip performed from the base of the apparatus

7. What defines the 'Russian Bar' apparatus?

- A) A long, flexible pole held by two porters for a flyer to perform aerial tricks**
- B) A set of parallel bars used for synchronized tumbling
- C) A weighted rope system used for training high-wire balance
- D) A stationary platform for aerial silks mounting

8. What is the 'safety factor' (or working load limit) standard for aerial circus rigging cables in most professional environments?

- A) 2:1
- B) 5:1
- C) 10:1**
- D) 1:1

9. In the history of circus, what significant invention did Jules Léotard introduce in 1859?

- A) The unicycle
- B) The flying trapeze**
- C) The human cannonball
- D) The trampoline

10. What physiological phenomenon is 'spotting' primarily designed to prevent during rapid rotational movements?

- A) Hypoxia
- B) Vertigo and disequilibrium**
- C) Muscle atrophy
- D) Tendonitis

11. Which circus discipline specifically utilizes 'plumes' (weighted leather bags) as part of a performance?

- A) Juggling clubs
- B) Diabolo
- C) Rope spinning**
- D) Tightwire walking

12. What is the technical name for the thick, protective mat used specifically under aerial apparatus to absorb impact?

- A) Landing zone
- B) Crash mat**
- C) Tumbling strip
- D) Safety webbing

13. What is a 'fly' in the context of stage rigging for circus acts?

- A) An aerial performer who has left the apparatus
- B) The vertical movement of sets or performers using a counterweight system**
- C) A specific type of knot used for high-tensile loads
- D) A hand-balancing technique performed on vertical blocks

14. Which act is characterized by the use of a 'cushion' on the performer's shoulder to support the weight of a partner?

- A) Hand-to-hand balancing**
- B) Banquine
- C) Risley
- D) Acrobatic bike riding

15. In the study of physics applied to the tightwire, what is the primary purpose of the long balancing pole?

- A) To decrease the total mass of the performer
- B) To lower the centre of mass and increase the moment of inertia**
- C) To increase the tension in the wire
- D) To provide a visual marker for the audience

16. Which of the following best defines 'Risley' circus work?

- A) A performer juggling items with their feet while lying on their back**
- B) A partner throwing a flyer into the air for acrobatic feats
- C) A high-wire act performed without a safety net
- D) A static strength hold on a suspended hoop

17. What is the primary material component of modern high-performance aerial silks (tissu)?

- A) Low-stretch polyester
- B) High-stretch tricot nylon or polyester blend**
- C) Heavy-duty cotton canvas
- D) Braided hemp rope

18. The 'Cyr Wheel' is structurally defined by which geometric properties?

- A) A single-hoop circular frame slightly larger than the user's reach**
- B) A double-hoop frame designed for two-person balance
- C) A triangular frame used for asymmetric motion
- D) A rectangular lattice structure for vertical climbing

19. In contortion, what is the 'backbend' often referred to as in technical terminology?

A) Triple fold

B) Bridge or chest stand

C) Dorsal flexion

D) Pike extension

20. What is the 'factor of safety' in rigging calculation?

A) The ratio of the breaking strength of a component to its maximum working load

B) The total weight of the performer plus the weight of the apparatus

C) The number of knots used to secure a load

D) The frequency of inspection required per month