

ACROSS

- 1 _____ is the process by which the embryo is formed and develops.
- 3 The ______ is known as the primitive gut that forms during gastrulation in the developing blastula.
- 7 The ______ nerve cord is one of the embryonic features unique to chordates, along with a notochord, a post-anal tail and pharyngeal slits.
- 11 ______ is a phase early in the development of animal embryos, during which the morphology of the embryo is dramatically restructured by cell migration.
- 14 A ______ is an embryo at an early stage of embryonic development, consisting of approximately 12-32 cells in a solid ball contained within the zona pellucida.
- 15 _____ is a primary germ layer which forms during gastrulation when some of the cells migrating inward to form the endoderm form an additional layer between the

- endoderm and the ectoderm.

 17 The term _____ pole refers to the hemisphere of a blastula embryo which contains large yolky cells that divide very slowly.
- 21 The term ______ pole refers to the hemisphere of a blastula embryo which consists of small cells that divide rapidly, in contrast with the vegetal pole.
- 22 The _______ is the primary germ layer which emerges first during embryogenesis and forms from the outermost of the germ layers.
- 23 ______ is a physiological process involving the growth of new blood vessels from pre-existing vessels.
- 24 The _____ is a flexible, rod-shaped body found in embryos of all chordates which is composed of cells derived from the mesoderm and defines the primitive axis of the embryo.
- 28 ______ is the expansion of one cell sheet over other cells. Takes place during gastrulation.

- 29 A ______ is an opening into the archenteron during the embryonic stages of an organism
- organism.

 30 _____ is the division of cells in the early embryo.
- 31 The ______ is the structure formed in early human embryogenesis, after the formation of the blastocele, but before implantation, possessing an inner cell mass, or embryoblast, and an outer cell mass, or trophoblast.

DOWN

- 2 The ______ stage of embryonic development in animals follows the morula and precedes the gastrula stage in the developmental sequence.
- 4 _____ is one of the primary germ layers formed during animal embryogenesis when cells migrating inward along the archenteron form the inner layer of the gastrula.
- 5 A ______ is the fluid-filled central region of a blastocyst.

- 6 ______ is the term for the cells formed by cleavage of the ovum in very early embryonic development.
- A _____ is the cell that results from fertilization.
- 9 _____ is the process in animal development by which the ectoderm, endoderm, and mesoderm develop into the internal organs of the organism.
- 10 The ______ streak is a structure that forms during the early stages of embryonic development, characterized as a furrow in the midline of the embryonic disk at the future caudal end of the embryo.
- 12 ____s are cells forming the outer layer of a blastocyst, which provide nutrients to the embryo and develop into a large part of the placenta.
- 13 During the early stages of embryonic development, a shallow groove, the _____ groove, appears on the surface of the primitive streak
- 16 A ______ layer is a collection of cells, a primary tissue layer, formed during animal embryogenesis.
- 18 Formation of neural
 ______ is the first step of
 neurulation in human
 embryology. It is created by a
 flat thickening opposite to the
 primitive streak.
- 19 _____ is fusion of gametes to form a new organism of the same species.
- 20 The _____ knot is the organizer for gastrulation in vertebrates, starting as a regional knot of cells that forms on the blastodisc immediately anterior to where the outer layer of cells will begin to migrate inwards.
- 25 The _____ phase of embryonic development, which follows after the blastula stage, is seen in all animals except the sponges.
- 26 In early embryogenesis, the

 _____cell mass is the
 mass of cells inside the
 primordial embryo that will
 eventually give rise to the
 definitive structures of the
 fetus.
- 27 Following primary and secondary neurulation, the neural ______ is the developing vertebrate embryo's precursor to the central nervous system.