

	Word	Definition	Synonym
1	organic compound	compounds that contain carbon	carbon
2	inorganic compound	compounds that do not contain carbon	no carbon
3	photosynthesis	the complex process of capturing the energy in sunlight and changing it into food	light makes food
4	stomata	the small openings on the underside of a leaf that allow carbon dioxide to enter and oxygen to leave the leaf	breathe
5	respiration	the process by which cells break down food to release energy using oxygen	uses oxygen
6	gas exchange	process through which different gases are transferred in opposite directions across a specialized respiratory surface	breathing
7	selectively permeable	a property of cell membranes that allows some things to pass through but not all things	picky
8	passive transport	the movement of materials through a membrane without using energy	no energy
9	diffusion	when molecules move from high to low concentration	high to low
10	osmosis	diffusion of water	water
11	active transport	the movement of materials through a membrane that uses energy	energy
12	cell cycle	the regular sequence of growth and division that cells undergo	cell life
13	interphase	the longest stage of the cell cycle where the cell grows, copies its DNA, and prepares to divide	resting
14	replication / replicates	the process by which a cell makes a copy of the DNA in its nucleus	copy
15	mitosis	the stage of the cell cycle where the cell's nucleus divides into two new nuclei	1 to 2

16	prophase	first part of mitosis; chromatin forms rods and spindle fibers form a bridge between ends of the cell	first
17	chromatin	material in cells that contains DNA and carries genetic information	DNA
18	chromosome	rod-shaped cellular structure made of condensed chromatin	DNA
19	chromatid	one of the identical rods of a chromosome	chromosome
20	metaphase	part of mitosis where the chromosomes line up across the center of the cell and attaches to a spindle fiber at its centromere	meet in the middle
21	anaphase	part of mitosis where the centromeres split and the two chromatids separate; one chromatid moves along the spindle fiber to one end of the cell while the other chromatid moves to the opposite end	move away
22	telophase	part of mitosis where chromosomes begin to stretch out and lose their rod like appearance; a new nuclear membrane forms around each region of chromosomes	two regions
23	cytokinesis	the final stage of the cell cycle where the cytoplasm splits creating two new cells	cytoplasm
24	cell plate	during cytokinesis in plants, a structure called a cell plate forms across the middle of the cell; the plate gradually develops into new cell membranes and new cell walls then form around the cell membrane	pre cell wall