

Eukaryotic Cell Organelles and Structures

Cell Structure / Component	Composition	Function
Basal Body	9+0 microtubule triplets	Organize structure of cilia and flagella
Cell Wall*	Contains cellulose fibrils	Support and protection
Central vacuole	Water, ions, sugars and some proteins	Water and ion reservoir
Centriole**	9+0 pattern of microtubules	Forms basal bodies that give rise to microtubules
Chloroplast*	Inner membrane (grana) within double membrane, chlorophyll and accessory pigments	
Chromatin	DNA strands and associated proteins	Heredity information, and Control of the cell
Cilia and flagella	9+2 pattern of microtubules	Movement of cell
Cytosol	Fluid medium of water, amino acids and ions, etc	Reservoir for raw materials for cellular synthesis
Cytoskeleton	Microtubules and microfilaments	Cell shape and movement of parts
Endoplasmic Reticulum (ER)	Membranous flattened channels and tubular channels	Synthesis / modification of proteins and other substances and transport by vesicle formation
Endoplasmic Reticulum, Rough	Has ribosomes at	