Geologic Timeline Assignment

You will make a geologic timeline showing when the eras and periods occurred. You will start with the formation of the Earth 4.5 billion years ago. Each period needs to have at least one drawing or picture to illustrate an event that occurred during that period. All mass extinctions should also be included. You can choose any five additional events to place on the timeline (be sure to illustrate it with a drawing or picture). You will choose your own scale; make sure you write it on the timeline so I know what you chose. Obviously, the timeline will probably take up several sheets of paper.

List of **periods/eras** for timeline from oldest to most recent:

- Precambrian time
- Cambrian Period (543-510 million years ago)
- Ordovician Period (510-438 mya)
- **Mass Extinction**
- Silurian Period (438-408 mya)
- Devonian Period (408-360 mya)
- **Mass Extinction**
- Carboniferous Period (360-286 mya)
- Permian Period (286-245 mya)
- **Mass Extinction**
- Triassic Period (245-208 mya)
- **Mass Extinction**
- Jurassic Period (208-144 mya)
- Cretaceous Period (144-66 mya)
- **Mass Extinction**
- Paleogene Period (66-34 mya)
- Neogene Period (24-0 mya)
- **Significant Mammalian Extinction**

Rubric for Grading

- 6 mass extinctions = 6 points
- 11 periods + Precambrian time + illustrations for each = 3 pts each = 36 points
- 5 selected events + illustrations = 5 points
- Scale and key = 8 points
- Creative, artistic, easy to follow, colored = 5 points

Total points = 60 points

Due _____

Era	Period	Epoch	Million Years Ago (MYA)	Plant Life	Animal Life
		Holocene	(0.01–0)	Human influence on plant life	Age of *Homo sapiens*
		Significant Mammalian Extinction			
	Quaternary	Pleistocene	(1.80–0.01)	Herbaceous plants spread and diversify.	Presence of Ice Age mammals. Modern humans appear.
		Pliocene	(5.33–1.80)	Herbaceous angiosperms flourish.	First hominids appear.
		Miocene	(23.03–5.33)	Grasslands spread as forests contract.	Apelike mammals and grazing mammals flourish; insects flourish.
Cenozoic	Tertiary	Oligocene	(33.9–23.03)	Many modern families of flowering plants evolve.	Browsing mammals and monkeylike primates appear.
		Eocene	(55.8–33.9)	Subtropical forests with heavy rainfall thrive.	All modern orders of mammals are represented.
		Paleocene	(65.5–55.8)	Flowering plants continue to diversify.	Primitive primates, herbivores, carnivores, and insectivores appear.
		Mass Extinction: 50% of all Species, Dinosaurs and Most Reptiles			
	Cretaceous		(145.5–65.5)	Flowering plants spread; conifers persist.	Placental mammals appear; modern insect groups appear.
Mesozoic	Jurassic		(199.6–145.5)	Flowering plants appear.	Dinosaurs flourish; birds appear.
		Mass Extinction: 48% of All Species, Including Corals and Ferns			
	Triassic		(251–199.6)	Forests of conifers and cycads dominate.	First mammals appear; first dinosaurs appear; corals and molluscs dominate seas.
		Mass Extinction ("The Great Dying"): 83% of All Species on Land and Sea			
	Permian		(299–251)	Gymnosperms diversify.	Reptiles diversify; amphibians decline.
	Carboniferous		(359.2–299)	Age of great coal-forming forests; ferns, club mosses, and horsetails flourish.	Amphibians diversify; first reptiles appear; first great radiation of insects.
		Mass Extinction: Over 50% of Coastal Marine Species, Corals			
Paleozoic	Devonian		(416–359.2)	First seed plants appear. Seedless vascular plants diversify.	First insects and first amphibians appear on land.
	Silurian		(443.7–416)	Seedless vascular plants appear.	Jawed fishes diversify and dominate the seas.
		Mass Extinction: Over 57% of Marine Species			
	Ordovician		(488.3–443.7)	Nonvascular land plants appear on land.	First jawless and then jawed fishes appear.
	Cambrian		(542–488.3)	Marine algae flourish.	All invertebrate phyla present; first chordates appear.
			630	Soft-bodied invertebrates	
			1,000	Protists diversify.	
Precambrian Time			2,100	First eukaryotic cells	
			2,700	O_2 accumulates in atmosphere.	
			3,500	First prokaryotic cells	
			4,570	Earth forms.	