

Layer of Earth	Approximate Thickness	Approximate Temperature	Made up of . . .	Other Details
Crust	≈ 5 - 50 miles thick	Varies	<u>Solid</u> - <u>soil</u> & <u>rock</u>	- <u>outermost/thinnest layer</u> - broken into smaller pieces, called <u>tectonic plates</u> - where we <u>live</u> ; includes mountains, rivers, valleys, etc.
Mantle	≈ 1,800 miles thick	Top <u>1,600</u> °F Bottom <u>7,900</u> °F	- has properties of <u>liquids</u> & <u>solids</u> - upper mantle is solid rock - inner mantle is partially melted	- the <u>thickest</u> layer - has <u>convection currents</u>
Outer Core	≈ 1,400 miles thick	approximately <u>4,000</u> °F	<u>Liquid</u> (<u>molten liquid</u>) - mostly <u>iron</u> (& nickel)	- less <u>pressure</u> , but high <u>heat</u> cause metals to be a liquid - <u>magnetic field</u> generated by rapidly circulating <u>outer core</u>
Inner Core	≈ 800 miles thick	approximately <u>9,000</u> °F (similar to the temp of the sun, only hotter) 7,900 - 11,000 °F	<u>Solid</u> - mostly <u>iron</u> (& <u>nickel</u>)	- Extreme amounts of <u>pressure</u> from the above layers cause it to be <u>solid</u> - <u>hottest</u> part of our earth

Other Important Details:

The center of the earth to the surface is approximately 4,000 miles

lithosphere { approximately 60 miles thick, made up of the crust & upper mantle, is made up of tectonic plates (float on inner mantle); mostly under water,
has approximately 12 large plates & many smaller ones, rigid

a sthenosphere { approximately 60 miles thick, hot liquid

seismograph an instrument that measures/records earthquake details (force & duration)