

Fold Systems - 1

Rocks are deformed (squeezed) into folds generally deep within the Earth's crust. To produce folds, the process of deformation is much like taking a piece of rug and holding down one end while slowly pushing from the other end. If you continue to push the ends together, the rug will develop one or more folds, giving the surface a "rippled" look.



Two of the most common types of folds are anticlines and synclines. If the letter "S" is laid on its side, it looks much like an anticline-syncline pair.

Anticlines and synclines are easy to understand if one imagines a stack of pancakes. As the pancakes are cooked, they are stacked one on top of the other in a pile. The first cooked is on the bottom and the last cooked is on the top. Rocks are stacked in a similar fashion: the oldest rocks are on the bottom of the pile and the youngest are on the top. As the stack of rocks is folded, the oldest rocks are pushed up in the middle of an anticline and the youngest rocks are pushed down in the middle of a syncline. In eroded folded areas, the location of the oldest rocks in relation to the youngest rocks defines whether you are looking at an anticline or a syncline.

