Chapter 15
Section 2

Scientists use differences in _____ and _____ to group organisms.

Answer this question in your notes.

How do scientists decide if organisms are the same species?

In 1942 Ernst Mayr proposed the _____ species _____ .

It stakes that a biological species is a group of _____ or potentiating interbreeding _____ population that are reproductively _____ from other such groups.

What does this mean?

Reproductive isolation occurs when a _____separates groups.

Sometimes these barriers are not complete so we get _____ .

Can you think of a hybrid animal?

Asian elephants and African elephants do not _____. They are separate species.

The biological species concept fails when _____ to organisms that reproduces _____ .

Modern biologists recognize species by _____ their features.

Only about 1.5 millions species have been described, but there are an estimated __ million species in the tropics (only 500, 000 have been _____ .)

Convergent Evolution- organisms evolve similar features _____ often because they live in similar _____ .
i.e.: wings of _____and wings of _____.

Analogous characters- similar features that evolve through _____ evolution.

Phylogeny- the _____ history of a species

Cladistics- a system of taxonomy that

_____

phylogenies by inferring

_____ based on

similarities.

Derived Traits- unique charcterisitcs.

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