

A Tale of Two Pandas

Conclusion: Consensus is a process

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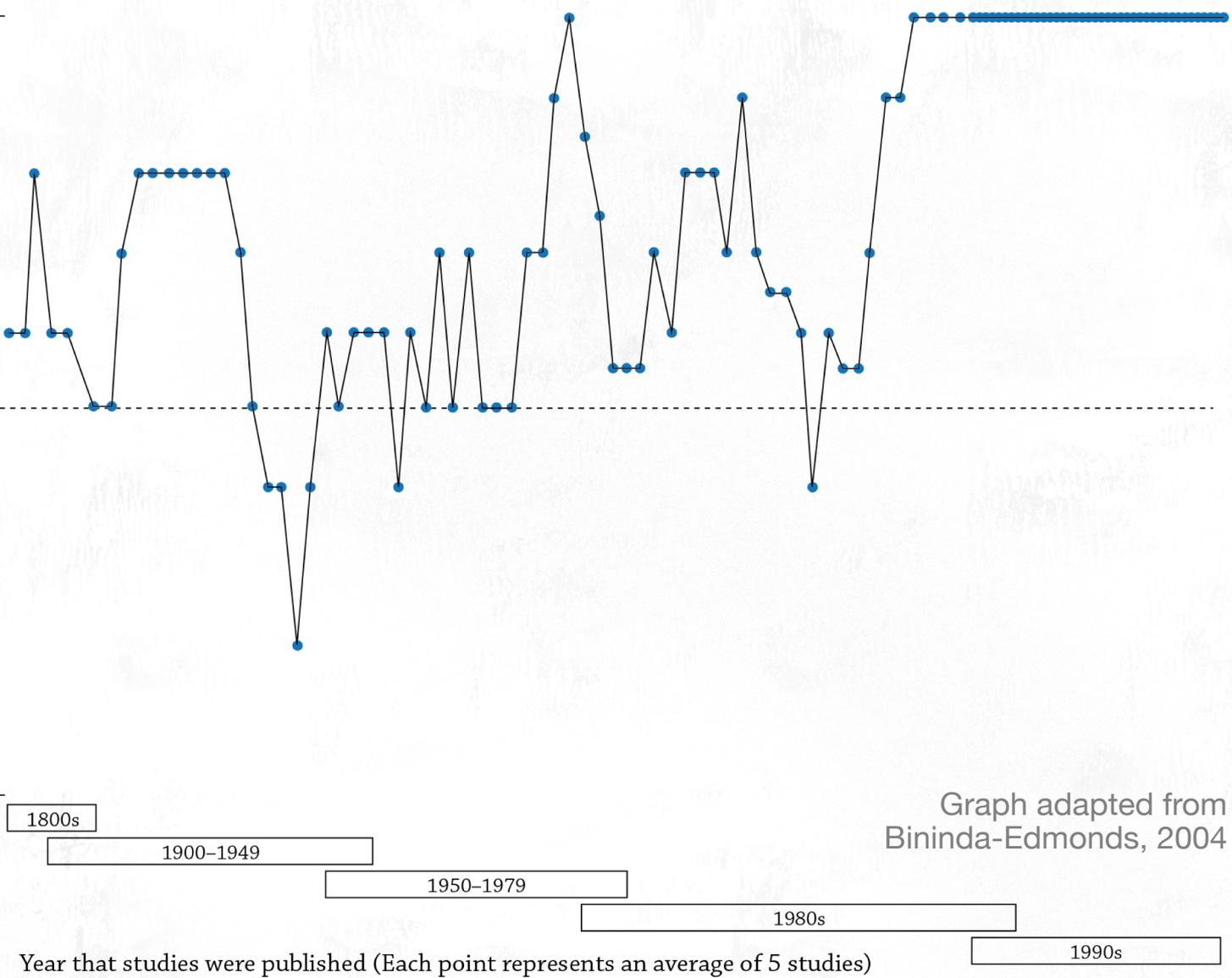


The giant panda is a member of the bear family.

Agree 100%

The giant panda is a member of the raccoon family.

Agree 100%



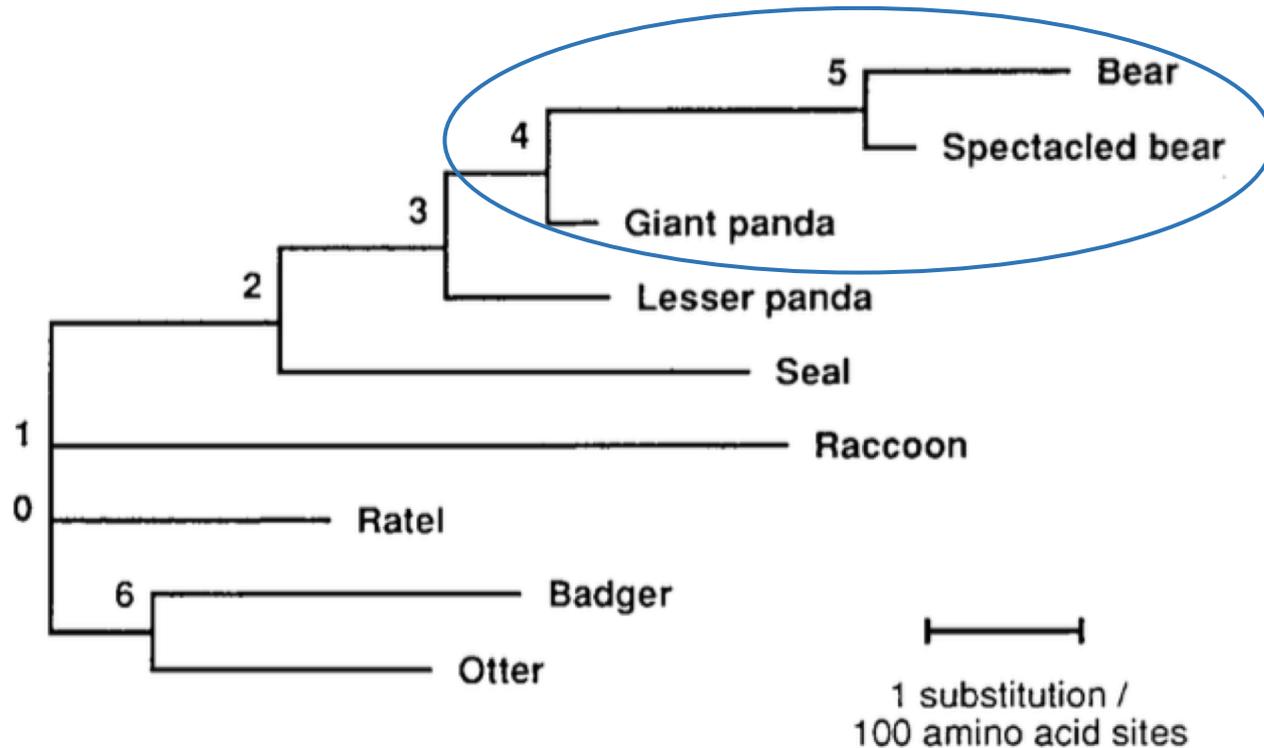
Graph adapted from Bininda-Emonds, 2004

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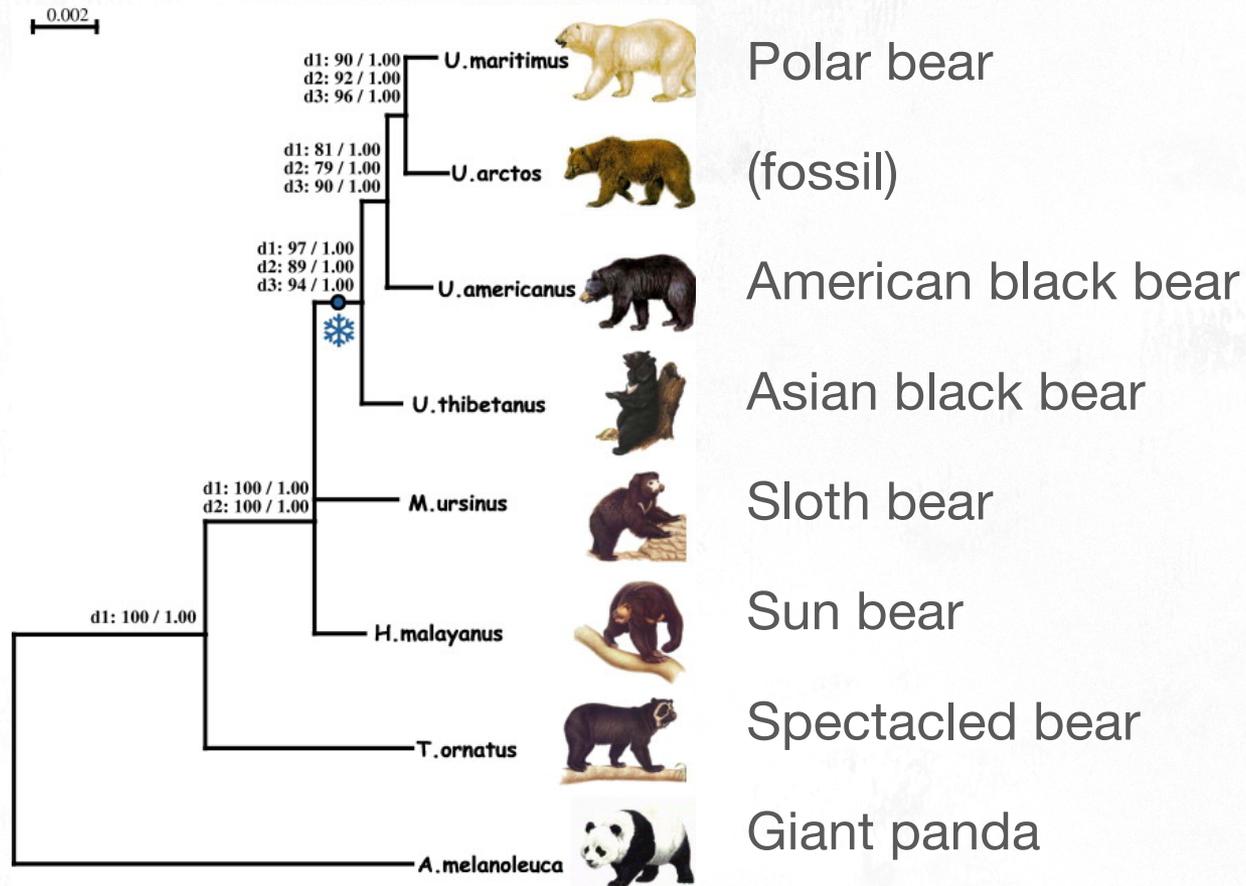
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The new data supported a different tree:



In 2008, a DNA analysis of 14 genes across 8 species of bears supported this tree:



The giant panda genome was published in 2009



LAURA SANDERS, SCIENCE NEWS SCIENCE 12.13.09 5:05 PM

GIANT PANDA GENOME REVEALS WHY IT EATS SHOOTS AND LEAVES

WHAT'S BLACK AND white and read all over? The giant panda genome. All 2.4 billion DNA base pairs of a 3-year-old female panda named Jingjing have been cataloged, researchers report online Dec. 13 in Nature. The information will help researchers understand panda traits such as finicky diets. A thorough understanding of panda genetics may aid conservation efforts for the endangered bear.

www.wired.com/2009/12/giant-panda-genome/

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“Why is there so much uncertainty in those branches of science in which observation provides the major material for scientific theories? In the case of the relationship of the giant panda we have seen that the very same evidence was evaluated very differently by anatomists and by students of behaviour. There was no other way to determine which of the two conclusions was correct except by providing additional data and analysing each piece of evidence more critically. When this was done, everything fell into place.”

—Ernst Mayr

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