



# Webster's High School

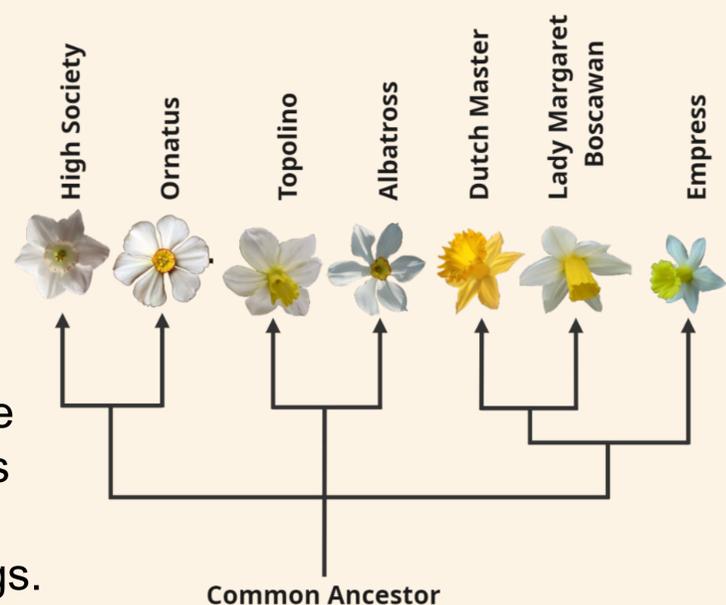
The James Hutton Institute

## Are all daffodils the same?

### Phylogenetic relationships

#### Why is it important to understand the phylogenetic relationships between the organisms?

Understanding the 'family tree' of life, or phylogenetic relationships, helps us see how every animal, plant, and microorganism is related through evolution. This allows us to trace the origins of key characteristics, like how plants developed flowers, or animals gained flight, showing the connections between all living things.



#### How does this knowledge help us to understand and prepare for challenges facing plants and other organisms?

Knowing these evolutionary connections helps us tackle big challenges facing our planet. We can better track and fight the spread of diseases in people, animals, and plants. In addition, it guides efforts to protect unique wildlife and find useful traits, such as heat resistance in wild relatives to help crops survive climate change.