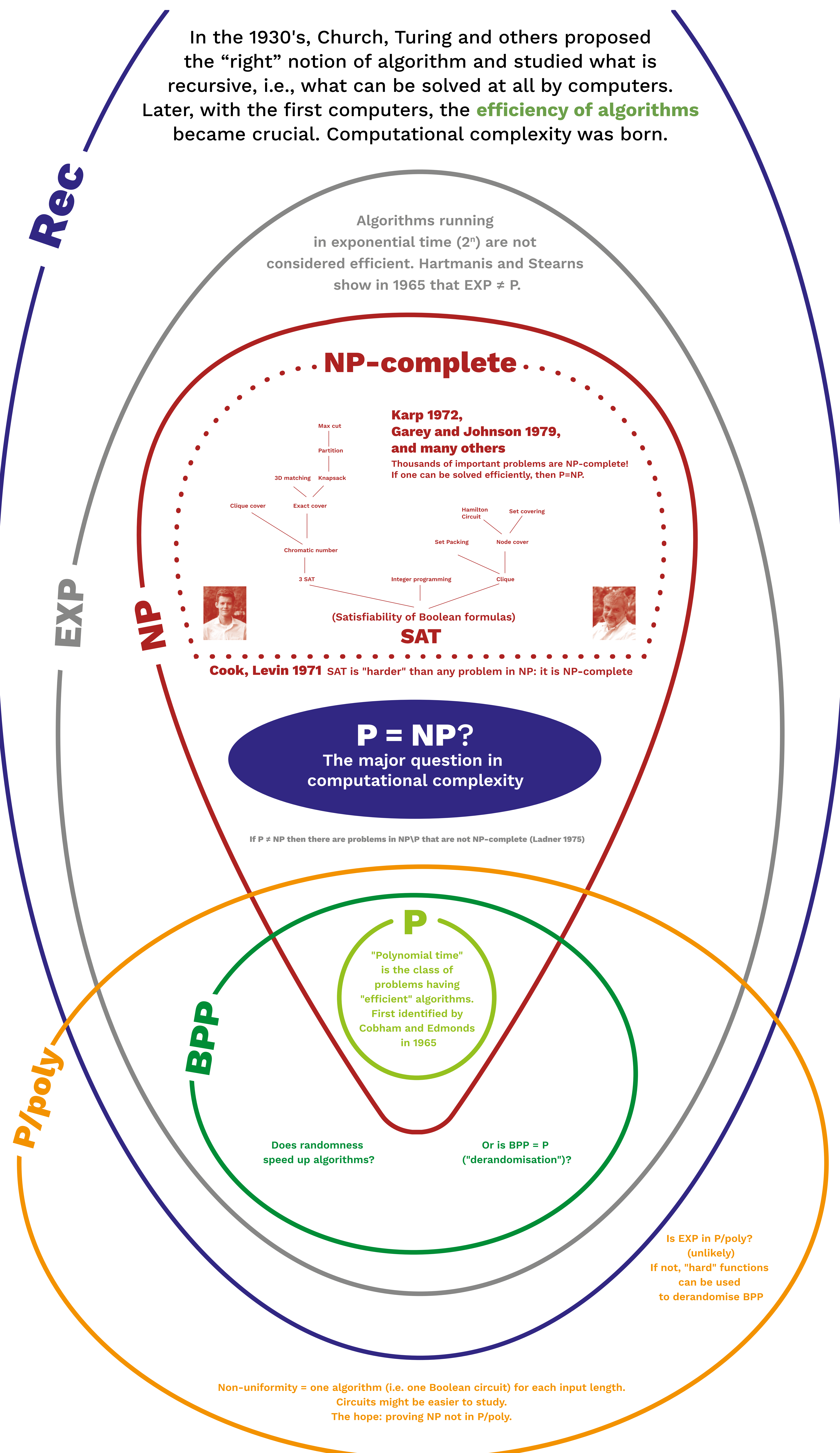


Computational Complexity

Classifying problems by hardness

In the 1930's, Church, Turing and others proposed the "right" notion of algorithm and studied what is recursive, i.e., what can be solved at all by computers. Later, with the first computers, the **efficiency of algorithms** became crucial. Computational complexity was born.



Rec
problems that can be solved by computers

EXP
Exponential time

NP
Nondeterministic Polynomial time: solutions can be verified efficiently

BPP
Bounded-error Probabilistic Polynomial time