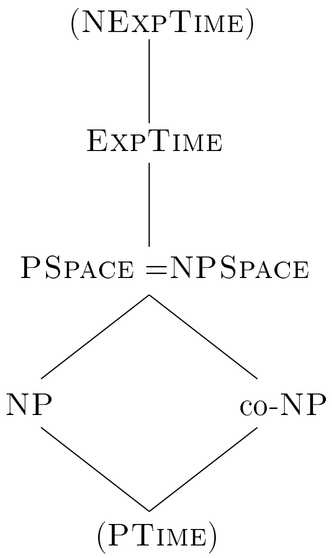
Complexity Classes

A problem P is *in a complexity class* C if P is accepted by a Turing machine with a certain behavior:

	deterministic	non-deterministic
poly.time	PTime	NP
poly.space	PSpace = NPSpace	
exp.time	ExpTime	NExpTime



A problem P if *hard* for a complexity class C if every problem in C can be *polynomially reduced* to P.

Christos H. Papadimitriou. **Computational Complexity.** Addison-Wesley, 1994.