



# ◈ Cumulative Distribution Function and Law

## 1 Why

If two random variables have the same cumulative distribution functions, will they have the same law? And the converse? NEED: probability space construction from cumulative distribution function.

## 2 Result

**Proposition 1.** *The cumulative distribution functions of two random variables are equal if and only if their laws are equal.*

*Proof.* □





