

## Why the parties *might* choose to maximize average utility

This is my summary of Rawls's argument in *A Theory of Justice*, §27, pp. 164–5.

### Two conditions must be met

1. Maximizing expected utility is the correct rule of decision making for them to use.
2. The parties assign equal probabilities to being any particular person.

### What does it mean to maximize expected utility?

	possible outcome 1 probability(value) = expected value	possible outcome 2 probability(value) = expected value	expected utility sum of expected values
Option 1	$.75(100) = 75$	$.25(80) = 20$	95
Option 2	$1/3(90) = 30$	$2/3(120) = 80$	110

Illustration of the maximize expected utility rule

### Why average utility and expected utility are the same

Rawls claims that the average utility will be equivalent to the expected utility *if* the parties assume that the probabilities of being any member of society are equal. Here's an illustration of his point.

Suppose the parties belong to a society of five people (A–E) and that they have to choose between two sets of rules. Which set they choose will determine which person gets what, represented numerically.

	A	B	C	D	E	Total	Average
Set I	25	30	40	70	50	215	$215 \div 5 = 43$
Set II	60	15	30	20	75	200	$200 \div 5 = 40$

Average utility

	A	B	C	D	E	Expected utility
Set I	$25 \div 5 = 5$	$30 \div 5 = 6$	$40 \div 5 = 8$	$70 \div 5 = 14$	$50 \div 5 = 10$	sum = 43
Set II	$60 \div 5 = 12$	$15 \div 5 = 3$	$30 \div 5 = 6$	$20 \div 5 = 4$	$75 \div 5 = 15$	sum = 40

Expected utility, assuming equal probabilities