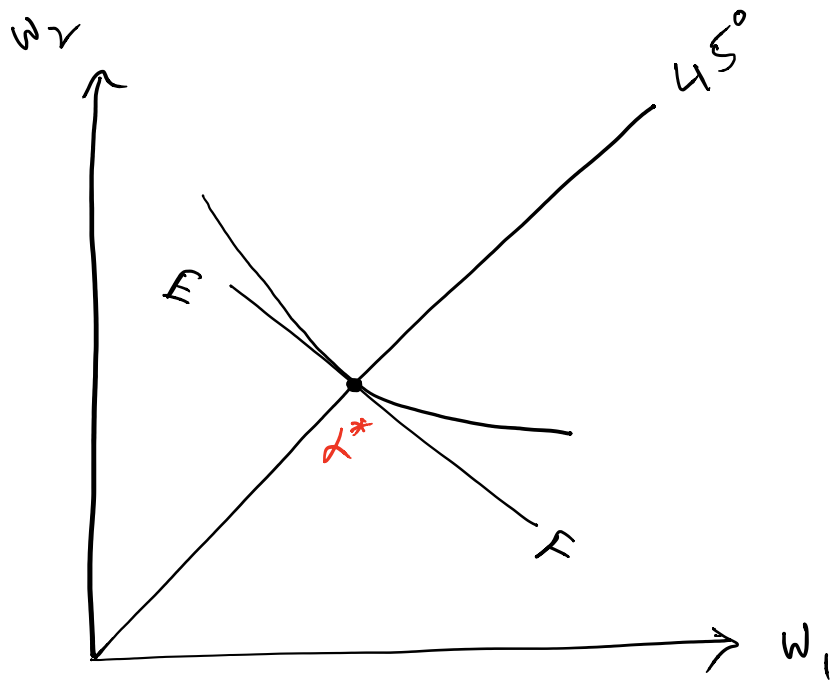
Equilibrium with a Identical Consumers



Full insurance, pareto efficient outcome

Zero profit condition implies that the optimal contract lies on the 'fair odds' line,

$$\frac{\alpha_2}{\alpha_1} = \frac{1-p}{p} \tag{1}$$

Maximization of consumer's utility subject to firm's zero profit condition implies that optimal contract lies on the 45^{degree} line. (Why? Check MRS=Slope of Fair Odds Line condition)

Equilibrium with Two Types of Consumers

Let the market have two kinds of consumers, with two different probabilities for accident

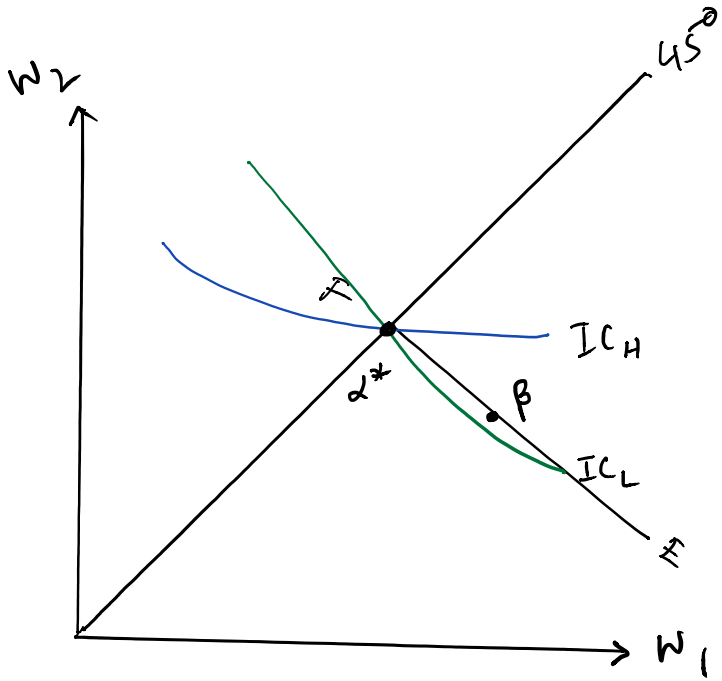
$p_H > p_L$

Let the proportion of people with p_H be η

We can have two kinds of equilibria in this market: pooling (uniform price, uniform quantity) or separating (a menu of two contracts, one each for each type)

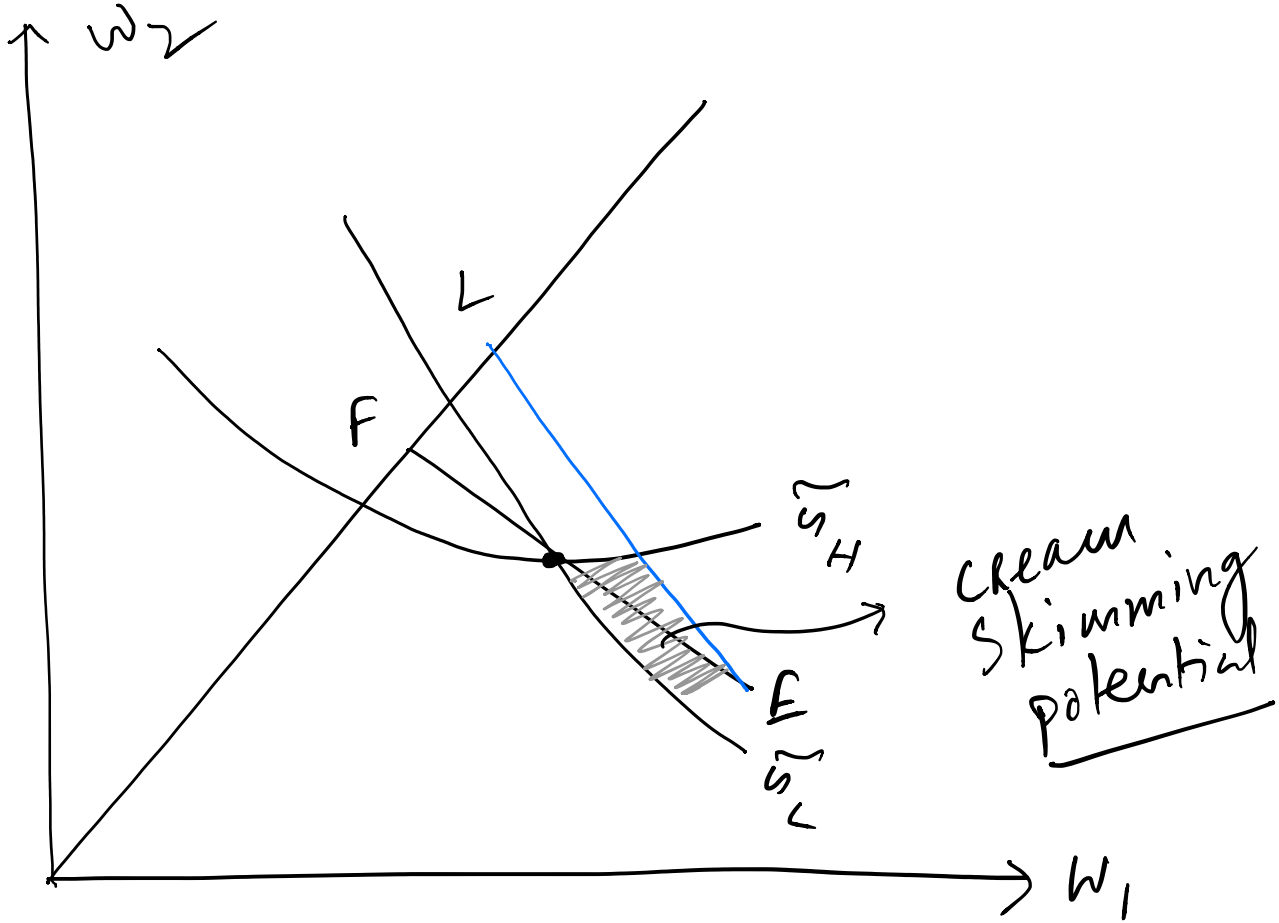
Does a full insurance pooing equilibrium work?

No.



What about a artial insurance pooling equilibrium?

Nope. Cream skimming. Same reason as before.



Separating Equilibria are the only hope

Characteristics of the separating equilbria:

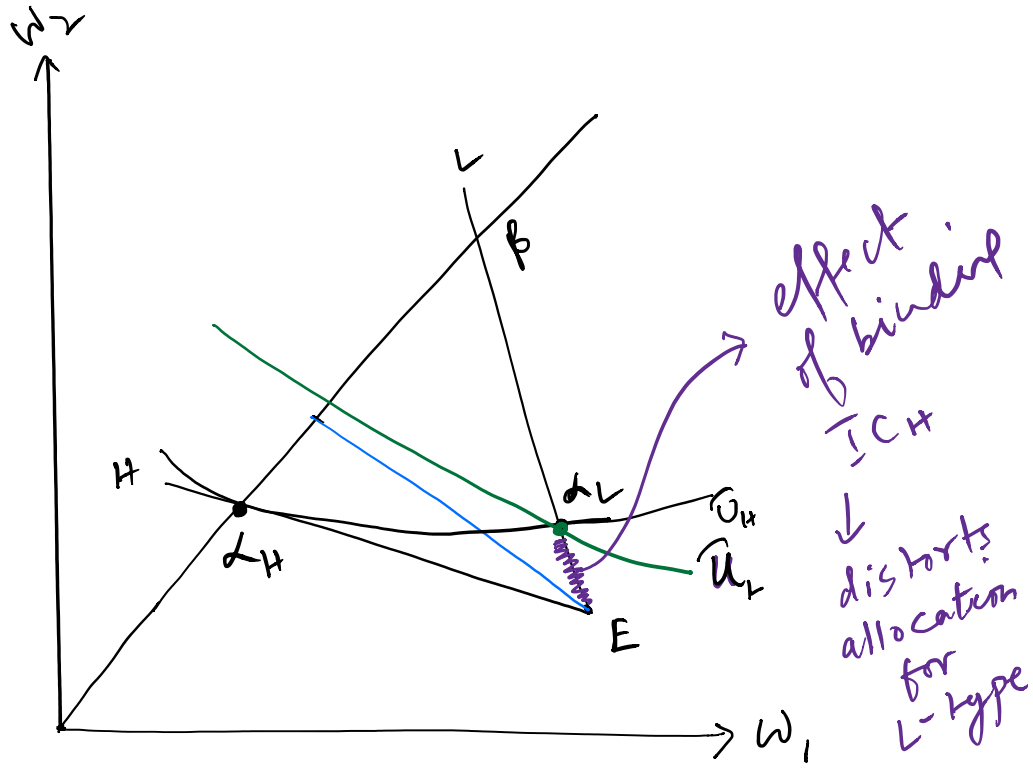
First we note that zero profit condition implies that the firm must earn zero profit on each type of contract. So each contract lies on the relevant zero profit line.

The high risk population gets full insurance, and the low risk population gets less than full insurance, again, this is an implication of the fact that the high risk types are likely to deviate towards the low-risk contracts.

Overall, a separating equilibrium under asymmetric information has inefficent insurance purchase by the low risk group.

This is what R-S refered to as 'strange properties' of a 'competitive' equilibrium.

Separating Equilibria



Does a separating equilibrium always exist?

No.