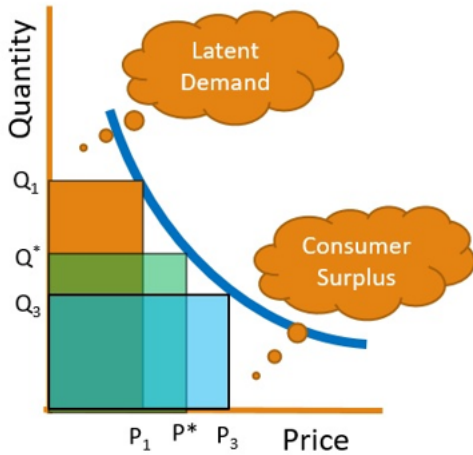


Summary	<ul style="list-style-type: none">Demand Response curveLatent demand and consumer surplus
	<div>Demand response curve</div> <div>Relationship between Price and Demand</div> <div><ul style="list-style-type: none">Demand response curve: what is the realized demand at a given price for a particular product or service.How do we estimate the demand response curve?</div>
<ul style="list-style-type: none">Interpret the given curveWhat is latent demand?What is consumer surplus?How is optimal price decided?	<div>Basic economics</div> <div></div> <div><ul style="list-style-type: none">The blue curve shown is the demand response curve.P* : Optimal price Q* : Optimal demandAs P↑ ⇒ Q↓Latent Demand: By reducing the price, we can capture more demand.Consumer Surplus: happens when the price that consumers pay for a product is less than the price they're willing to pay. It's a measure of the additional benefit that consumers receive because they're paying less for something than what they were willing to pay.So if we increase the price from P* to P3, the consumer surplus is going to be eaten away by that much (the light blue region).(Similar analogy goes for producer surplus)How is optimal price decided? There are a few ways to go about this:<ol style="list-style-type: none">Revenue Maximizing PriceProfit maximizing PriceNote: Both of the above prices are different.</div>
<ul style="list-style-type: none">What is Demand Response Curve?State the properties of demand response curve.What does it mean for the curve to be downward sloping?	<div>Demand response curve</div> <div><ul style="list-style-type: none">A Function that describes how demand for a product $D(p)$ varies as a function of its priceSimilar to the Demand curve in Economics, but for a single seller, in a single marketFour properties<ol style="list-style-type: none">Non-negativeContinuousDifferentiableDownward slopingDownward sloping: As P↑ ⇒ Q↓<ul style="list-style-type: none">This property sometimes may not hold. For example take an example for rolex watch, a luxury item. Its increase in price sometimes lead to increased demand due to the exclusivity appeal for the product.But these are exception cases, so we will not be considering them.</div>