NEP

NORWICH ECONOMIC PAPERS



VOLUME 23.

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COMPETITION RESULTS

From our essay and poster competitions

BOOK REVIEWS

From our students

A SPECIAL COLLABORATION

From another university economics journal

SPOTLIGHTS, ESSAY TIPS...

And much more!

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EDITOR'S FOREWORD

Dear All,

It is my immense pleasure to bring to you the 23rd Volume of the Norwich Economic Papers (NEP). This year has been a difficult one for many of us. When Covid-19 first struck in March 2020, I do not think any of us thought we would still be having online lectures and exams over a year later. Although this has been a time of struggle, uncertainty, and for some, loss, it has also been a time where we have seen kindness, support, reconnection, and collaboration. I always think when we cannot change the past, we should not dwell on what might have been and how different things would be if something else had happened. I think it is important to remember the past, and especially remember those who remain in memory, but we should learn and grow from the past, and embrace what we now have. With life beginning to return to normal, I hope that these traits of helping others and the wider community, of supporting others during difficult times, of appreciating the importance little things like meeting with old friends and eating out, do not go away as we leave Covid-19 in the past.

Our ambition this year was to interact even more with the ECO student body, with higher involvement and collaboration. We wanted to provide even more useful content to students to make this journal useful, insightful, and fun to read. This came in the form of our multi-format competition to promote inclusiveness, our student book reviews, and our annotated essay to help students with assignment tips and advice. I myself had an even loftier goal of not just more collaboration with our students, but collaboration across universities. That's why in this issue and the next we bring you special collaboration pieces with other university journals to give you an insight into how other universities (and other countries) have dealt with the pandemic.

I would like to take this opportunity to express how grateful I am to the NEP board members this year. With nearly all our meetings this year being online and with the ambitious amount of content we wanted to do, they never faltered in giving it their all. They have worked so hard in such a difficult year that I would like to thank both Will Towning and Hattie Weatherley for their incredible hard work and dedication to the NEP. And, as always, my extreme thanks to Ruth Badru for her ongoing support and passion for the NEP that make it such a joy to be on the board and to work with. Without you, this would not be possible. And finally, I would like to thank all the students who entered the competition, who volunteered for reviewing books, and for everyone who reads this issue. You are who make sure the NEP keeps on going.



Daniel Hempstead, Editor (2020-21)

NEP ANNUAL COMPETITION:

This year's annual NEP competition was released as a multi-format competition for all ECO students. This allowed students to play to their strengths and answer one of our 5 questions with either an essay or a poster format, and aimed to increase those taking part.

Despite Covid-19, we saw a great response from the students, and in this section you can see the winning entries and shortlisted entries that were all put to the staff and student vote to crown the winners.

Below our the questions they had to choose from:

David Hume: David Hume's 1756 work 'Of the Balance of Trade' is considered the first real exposition of an economic model. Economic history provides economists today with the essential materials for making good economic theory.

Use a pre-1900 model to describe a post-2000s economic issue of your choice.

Richard Thaler: Richard Thaler has been coined the father of behavioural economics and is the recipient of the Nobel Prize for Economics. Behaviour economics is the study of the effects of psychological, cultural, and social factors, among others, on individuals and institutions decisions. Gathering insights in behaviours during the pandemic - which has sent tremors through almost all areas of life - is important for policy and understanding how people may react to comparable events in the future.

Use behavioural economic theory to explain changes in consumer behaviour in the UK during the Covid-19 period. Chose to also answer 1) what impact might this have on policy or 2) how does this compare to other countries?

NEP ANNUAL COMPETITION:

Keynes-Hayek: John Maynard Keynes and Friedrich Hayek had contrasting views when it came to fiscal responses to recessions. The pandemic has resulted in significant fiscal expansion across the world, with many governments now facing near-record high fiscal deficits.

Governments around the world will soon begin to shift their fiscal responses from emergency to recovery mode. Make case for both a Keynesian and Hayekian fiscal response to the pandemic recession and conclude which approach you think best suits the current situation.

Elinor Ostrom: Elinor Ostrom was the first female Nobel Prize winner in Economics for her work on the Tragedy of the Commons and economic governance of shared resources. She based her research on case studies, and analysed rational choice showing how agents act with shared resources, creating some of the best environmental economics research.

Renewable energy is a rapidly growing industry with high levels of public investment. Would the green energy market survive in a completely free market with only private investment, or does it only grow due to government investment?

Hyman Minsky: Hyman Minsky is most well known for his work on financial markets. But he also contributed to some important work on employment and welfare policies. In 1969, Minsky argued for reforms of the welfare system, proposing a negative income tax or universal basic income. The pandemic has resurfaced some of Minsky's arguments for reforms in the welfare system, as many people have lost their jobs after businesses were required to close under government order.

Furlough or wage subsidy schemes have been a popular fiscal response taken by advanced economies during Covid-19. Governments will face the challenge of unwinding this support in the least harmful way. Offer a policy approach or solution which you think governments should take when removing these schemes in the future.

ESSAY COMPETITION:

PRIZE WINNERS

1ST PLACE:

SABRIA BEHILIL



KEYNES VS HAYEK

SABRIA BEHILIL

Should the government intervene to help a struggling economy, or should the market be left to make corrections itself? This is the question at the core of the Keynes and Hayek debate. Responding to recessions is something that many governments have had to face over time, but despite their prevalence across history there is yet to be a resounding consensus that arises in how to most optimally respond to a recession. This issue is highly pertinent in light of the COVID-19 recession, Britain's deepest recession on record (Partington, 2020). I will outline the idea behind both Hayekian and Keynesian responses and will consider which is most appropriate for the COVID-19 recession in the UK.

Keynes believed that the government should increase spending to stimulate aggregate demand to help a struggling economy out of recession as he believed that no automatic market forces were in place to help the economy recover in the event of a shock (Selgin, 2011). He argued that recessions are a result of aggregate demand deficiencies and increased precautionary savings. While a stimulus would increase fiscal deficits in the short run, he proposed that in the longer term once the economy had recovered the fiscal imbalance would be corrected naturally as spending and earning rose and people paid more in taxes (Wapshott, 2012).

Contrastingly, Hayek believed that recessions are necessary periods of liquidation following previous bouts of capital over-accumulation.

He believed in free markets and warned that government interventions to stimulate spending would simply delay the market adjustments necessary for recovery (Beaudry et al, 2014) and would lead to costly inflation.

The COVID-19 recession has seen household savings in the UK rise to the highest level on record, and GDP fell more than 20% in the second quarter of 2020 (Partington, 2020). Meanwhile, capital accumulation in the UK has risen at a relatively steady rate since the 1950's and did not see a notable spike before the recession hit (*See Figure 1, 2 and 3 for graphs showing household savings, GDP and Gross Fixed Capital Formation in the UK over time respectively*). This evidence does suggest that there may be some merit to the Keynesian argument that demand shocks are driving the recession. However, this recession is unlike past recessions in that it is not necessarily true that people are choosing not to spend money, but instead that there are new barriers to spending in many industries due to the need to remain home and the forced closure of all non-essential stores. This means that a stimulus may not be as effective as it normally would be as even if people have more money to spend, they may still face significant barriers to spending it in some sectors of the economy if restrictions are still in place. This characteristic has led to the recession having substantially different impacts on different sectors, of the industries that saw declining business some faced demand shocks whilst others saw supply-side shocks. A study which considered the recovery of various industries between April and May 2020 showed that demand-shocked industries recovered only 1.8% while industries which experienced a supply shock recovered 7.5% (Baqaee & Farhi, 2020). This further motivates that demand shocked industries might benefit the most from government intervention and that stimulus is an effective way to increase the rate of recovery of the British economy as these industries will take the longest to recover if left unaided. However, as the demand deficiency is partly driven by the barriers to purchasing from these sectors arising from restrictions it might be worth offering stimulus directly to the businesses to help them stay solvent while restrictions are in place.

Hayek argues that inflation will be the consequence of a fiscal stimulus, but it's worth noting that UK inflation is currently very low – 0.8% in December 2020 – and a rise in this might be the lesser of two evils (*See Figure 4 for graph illustrating UK inflation*). However, this risk could be minimised by implementing a

targeted stimulus package aimed at demand deficient industries rather than an economy wide effort. This would prevent unnecessary inflation in industries driven by supply shocks but would help demand deficient industries recover more quickly. A slight rise in inflation seems like an acceptable consequence in reducing the depth of demand decline in these sectors given a moderate rise in price levels would keep inflation at a manageable level.

It should however be considered that a Keynesian approach is not ideal when stagflation is a concern (Peterson, 1980). The UK is not currently seeing stagflation but it has been argued that it could arise post-recession if we stimulate aggregate demand without addressing the decline in aggregate supply as this will lead to excess demand and create a wage-price spiral as prices rise and workers demand higher incomes (Elliot, 2020). While this argument is well grounded theoretically, it doesn't consider that workers have significantly less bargaining power than has been seen in the past due to weaker unions and the relative rise of employer power (Elliot, 2020). As a result of this it's unlikely that workers will have the ability to influence their wages and this will serve to protect against a wage-price spiral - mitigating the threat of stagflation. Moreover, Carnell points out that stagflation would offer a benefit in modern times as it would reduce the real value of the incredibly high levels of public debt and would consequently reduce the costs of a Keynesian fiscal stimulus package (Elliot, 2020). Based on these two arguments, I conclude that stagflation is not a relevant concern against a Keynesian approach.

One of the main arguments made by Hayek is that a Keynesian approach only prolongs the duration of a recession by interfering with the free market mechanisms which would lead to the optimum economic adjustments needed for a sustained recovery (Beaudry et al, 2014). While the duration of a recession is certainly an important factor to consider, I believe that the severity of the recession is more pertinent. This is particularly true when we consider the unequal way in which this recession has impacted people across different wage levels. The poorest quintile of UK households saw a decline in monthly savings whilst monthly savings increasing for the other quintiles, with the richer households saving more as we move up the quintiles – with the exception of the richest quintile (but they too saw an increase in savings) (*See Figure 5 for Household Savings across Income Quintiles*). Compounding this, the households which saw the greatest reduction in their income as a result of the COVID-19 recession have seen the most

dramatic cut to their spending patterns (*See Figure 6 for Fraction of Reduced Spending by Income Decline*). These two pieces of information support that this recession is hitting the poorest households the hardest and that a Hayekian approach will only serve to widen inequality in the immediate term. Richer households are saving far more and are building up reserves of cash which will allow them to smooth their consumption over the duration of the recession, whilst poorer households are spending less and saving less, leaving them in a painful situation in which they cannot afford to maintain their consumption habits now and the low savings mean they will not be able to increase this sub-optimal level of consumption as the recession carries on. A Hayekian approach where no intervention is made, and the free market is allowed to reach peak levels of austerity will have a vastly unequal impact across the income distribution and will serve to widen inequality, which is highly inequitable and should not be an acceptable consequence of economic policy. If anything, this information serves to show that a Keynesian stimulus package should be targeted to benefit those on the lowest incomes and those who have seen their incomes fall the most as a result of the COVID-19 recession – as these households saw the most dramatic decline in their spending.

While I have spoken in general support of a stimulant package, I believe this should be aimed chiefly at subsidising incomes and minimise the extent that tax revenues are impacted to preserve funding for the NHS.

Conclusively, given the UK's record fall in GDP and the currently low levels of inflation, I think a targeted Keynesian approach to the COVID-19 recession is the most equitable and supported response. The stimulus package should act through subsidising incomes rather than cutting taxes, and should be targeted to benefit industries which have faced shocks to aggregate demand rather than targeting the economy broadly, as this will help prevent unnecessary inflationary pressures to industries which are facing supply-side shocks. The stimulus should also be aimed at benefitting those households who comprise the lowest income quintile and who saw their incomes fall the most as a result of the recession, in order to maximise the impact of the stimulus on spending and to prevent inequality rising.

SABRIA BEHILIL

Figure 1 - Household Savings (ONS, 2021a)

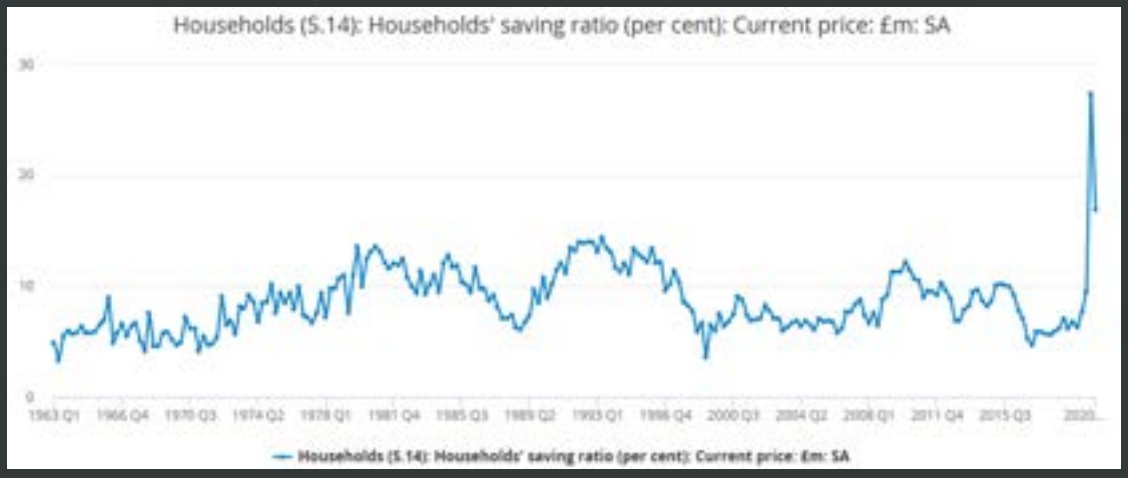


Figure 2 - UK GPD (ONS, 2021b)

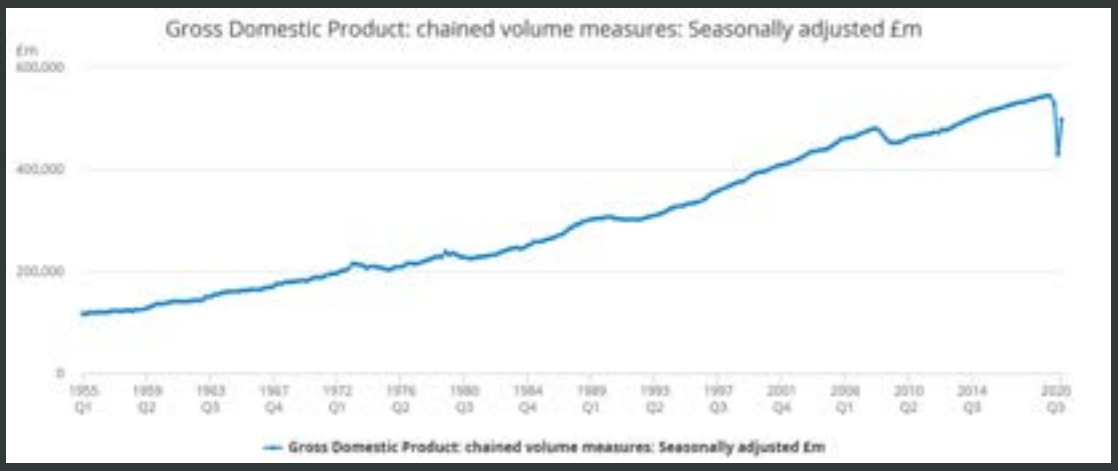


Figure 3 - UK Grossed Fixed Capital Formation (Trading Economics, 2021)

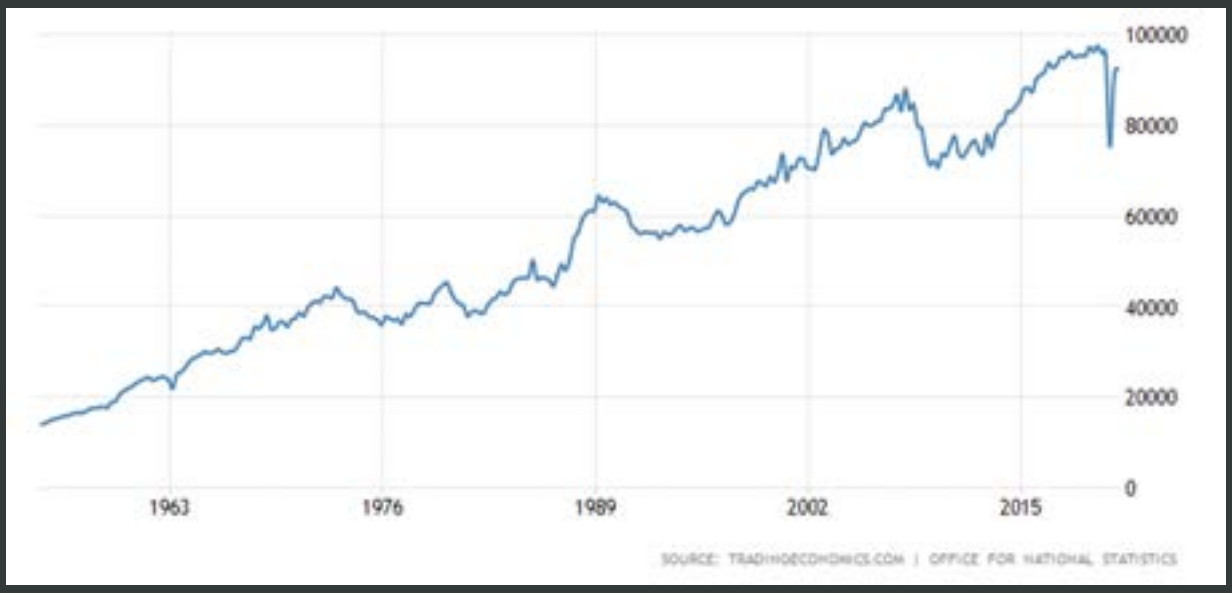


Figure 4 - UK Inflation by CPIH (ONS, 2021c)

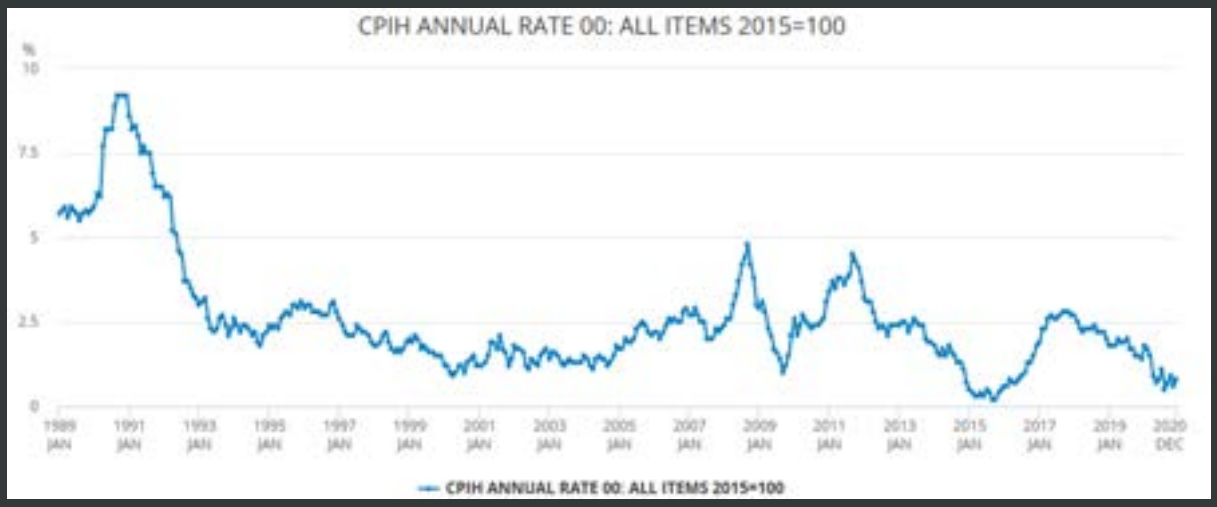


Figure 5 - Difference in Average Monthly Savings from March- September 2020 by Income Quintile (Davenport et al, 2020)

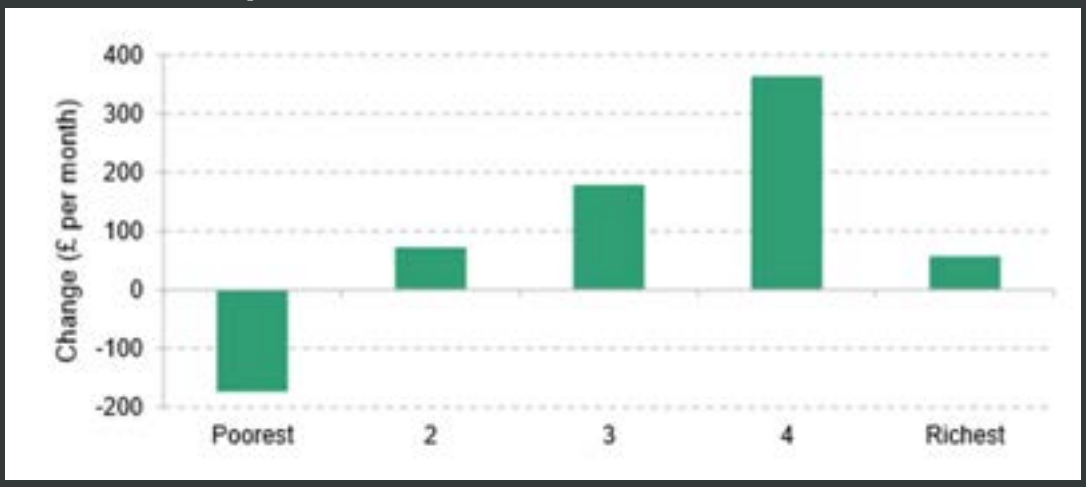
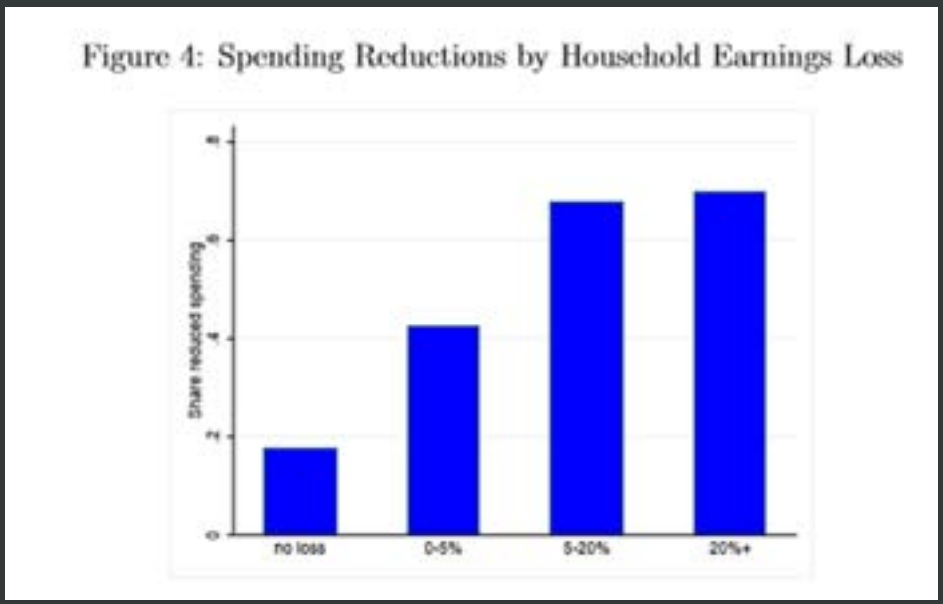


Figure 6 - Spending Reductions by Household Earnings Loss (Benzeval et al, 2020)



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2ND PLACE:

DEREN KARAUSTA



BEHAVIOURAL CONCEPTS ON COVID-19

DEREN KARAUSTA

Behavioural Economics is a study of psychological, cognitive, emotional, cultural, and social factors that can influence economic decision making. This school of thought challenges the fundamental concepts of economic ideology, with aim to transition away from a monodisciplinary field of study to a multidisciplinary, more complete understanding of economics. In this essay I will explore the immense importance of behavioural economics in the climate today with Covid-19 and the state of the economy, explaining how it has reshaped the way consumers make decisions due to uncertainty being at an all-time high. This essay will analyse if it is possible for governments to react effectively to this change in consumer decision making, with adaptive policy making that keeps up with the modern everchanging environment. We can ask ourselves the question – what does the future hold for economics and is Covid-19 a crucial turning point in history for economic thought?

Panic Buying

One main observation during the global pandemic that can be explained by behavioural economics is panic buying. Panic buying refers to a situation where consumers buy excessive amounts of necessity goods that limit the availability for others in society, such as the older generation. This behaviour was demonstrated by consumers particularity in the UK, consuming more goods than is needed with disregard for the most vulnerable individuals of society. Traditional economic theory cannot explain this occurrence because it violates the consumer axiom of rational choice. For example, traditional consumer

theory suggests that a consumer will always act in a rational way and consume a good that yields the highest utility and possible satisfaction. They will keep consuming the good until It reaches a point of diminishing marginal utility, where additional satisfaction from consuming one extra unit is marginally less than the one pervious to it. When this point of diminishing marginal utility is reached the rational consumer should stop consuming the good. This theory clearly cannot explain why consumers buy excessive amounts of goods such as toilet role or bread if it is not in their best interest and does not yield the highest utility.

Behavioural economics is needed to explain a situation of panic buying. For example, we can recognise that consumers may use heuristics that shorten the decision-making process in the real world. This is a mental shortcut that contradicts traditional economic thought, suggesting that consumers may not always act rationally because of real world constraints such as time and brain power (known as bounded rationality). One key shortcut or bias that can explain panic buying is the availability bias; that states an individual may rely on the most recent and easily recalled piece of information when making decisions. However, the most recent idea of anything like the global pandemic in 2020, was the 2002-2004 SARS outbreak. During this outbreak panic buying was an extremely common action with people buying excessive amounts of antibiotics and food resources, leading to an overall shortage. So, the consumers in 2020 will only recall the shortages that were present in 2002 -2004 outbreak, and thereby increase their consumption to avoid the inability to consume.

This availability bias exacerbated the situation and built upon a behavioural theory called the bandwagon affect. The bandwagon effect uses psychological techniques to explain this economic crisis of panic buying. We can show consumer decision making can be altered due to what other people are doing. For instance, initially a few individuals may panic buy as they remember what happened in previous evens, this causes a slight shortage and price rise from the increased demand. Eventually this action will gain momentum until it becomes the majority that are panic buying and those who are not are left to feel like the ‘odd ones out’, or they do not want to be charged a higher price at a later date. This interacts with a type of normative social influence that suggests someone can be easily influenced by others because of the fear of embarrassment or feeling out of place. Therefore, consumers will act in an irrational way solely from the influence of others originating from a bias in perception. This idea of panic buying occurs on

the basis of anticipation, we may anticipate what others will do so we convert to doing it ourself, or we may anticipate a price rise so we consume and contribute towards this shift in behaviour.

Digital Adoption and the use of Big Data

In a time of seclusion and isolation, Covid-19 has made lots of people convert to digital buying platforms, leading to an increase in online sales of 70% during the pandemic. The clothes shopping industry has also increased by 10% in the UK, even though the need for additional clothing is questioned with reduced face-to-face interaction. We can explore why online shopping has increased so much and the behavioural economics that is causing this increase in sales.

Traditional economics is limited in its explanatory ability to explain why clothing sales have increased by 10%, with companies like Boohoo and ASOS seeing increased of around 40%. A standard economic perspective would suggest that the immediate need for online clothing shops is redundant and would state that a rational decision maker should not increase consumption. Consumer theory suggests that buying a good should always have a purpose for the consumer and that individual would only buy it if their satisfaction is maximised. However, we have seen this is not the case as individuals do not have a use for excessive clothing shopping, with a study showing 45% of brits have brand new clothes in their wardrobe that have not been used yet. So, how can we explain this increase in consumption?

Behavioural techniques have changes consumer decision making during the Covid-19 period. For example, while so many people have more time on their hands, companies have used this as an opportunity to capitalise sales and target individuals specifically. This concept used is called big data, which is a consists of analysing consumer buying patterns and extracting important information that will be used for marketing. For instance, an individual may make a purchase on a Friday of every month because this is their ‘pay day’. The companies using big data will receive an algorithm for this pattern and send out persuasive marketing emails specifically to this consumer with offers and deals. This is an idea of using psychology and economics to increase sales. These promotion concepts may have a limited time offer that will interact with the psychology of missing out. The fear of missing out is a powerful tool that cannot be explained by traditional economics. A standard approach

would suggest that consumer decisions will not be altered or persuaded by emails if the good does not satisfy their needs. However, the reason the clothing industry has grown 10% during the Covid-19 period could be because individuals do not have the ability to think ahead and recognise the long-term use of the good and thereby consume it for immediate gratification. This is a concept known as the present bias, where individuals make rational impulsive decisions to gain a sense of short-term satisfaction, with little regard for the future or the long-term benefits. This irrational decision-making process is further enhanced by increased time spent on digital platforms during the Covid-19 period, where individuals ate subject to extreme marketing and advertisements.

Policy Implications

At a point of uncertainty, panic buying was an issue that needed to be addressed by policy makers particularly in the UK. In various large supermarkets they introduced regulations, advised by the government to restrict the amount of essential goods per household. For example, Tesco announced that each household will be allowed a maximum of 3 items on products like flour, pasta, toilet roll and antibacterial wipes. This was a policy that was forced into action from the power of excessive buying. Government ministers urged that this type of buying was the reason shortages have arisen in the UK. It has also been brought to the attention that this panic buying behaviour is escalating the spread of the virus, with increased staff and customers in supermarkets sharing close proximity with one another. This led to supermarkets creating their own policies, providing one-way systems and aisle separations to reinforce this consumer behaviour.

We can recognise that the introduction of big data marketing has very few regulations in the market today, as it is a fairly new concept. However, many individuals have stated that this is a form of consumer manipulation being used by companies to try and encourage passive buying. Some consumers have said they feel as though they have little freedom of choice and are pushed into making decisions with these promotion countdowns and expiry dates. In the future we may see more regulation in the world of big data, where consumers must consent to sharing information such as buying patterns or expenditure dates. However, we have identified that Covid-19 has increased this ‘consumer manipulation’ with increased time spent on phones and increased marketing advertise-ments from large companies.

3RD PLACE:

JAHANVI HASMUKHLAL



KEYNES VS HAYEK

JAHANVI HASMUKHLAL

Governments around the world will soon begin to shift their fiscal responses from emergency to recovery mode. Make case for both a Keynesian and Hayekian fiscal response to the pandemic recession and conclude which approach you think best suits the current situation.

Introduction:

John Maynard Keynes and Fredrich August Hayek were two prominent economists of the Great Depression-era with sharply contrasting views. Hayek was an Austrian-British economist and philosopher and he is best known for his deference of classical liberalism and the advocate of Austrian thought. Keynes was a British Economist that revolutionized economic thinking and arguably the great economist of the 20th century. His idea that government should stimulate the economy is widely used across countries to uplift the economy from a downturn. We will explore both economist viewpoints and use this to make a case for the fiscal repose to the pandemic recession.

Hayekian view:

Hayek's viewpoints derived from classical economic thought, where the economy should be left to the free market. He is a strong advocate of the idea of laissez-faire and therefore, there should be minimal government intervention within the economy. This is because he believed that individuals are rational and can make decisions freely. Furthermore, the pricing, production, and

economic cycle should also be left to the actions of individual agents. Since Hayek showed that people are better off through the system of freedom he explained that government intervention and interfering with the price system will cause misallocation of resources and unsustainable economic activity (BBC, 2011).

Hayek argued that fluctuations between business cycles were a result of the central bank's credit expansion which caused instability of the economic market due to the low-interest rate. The low-interest-rate makes credit artificially cheap and therefore economic agents make an investment with distorted price signals from the credit market (Beaudry, Galizia and Portier, 2017). Long-term investments such as bonds are more sensitive to interest rates compared to short-term investments and thus the artificially low interest will cause high artificial investment. This is known as malinvestment wherein the Austrian business cycle, these are badly allocated business investment from artificial low credit. It is believed that the Dot-com crash, the Great Depression, and the 2008 Financial Crisis were caused by central banks' poor decisions.

The application of Hayek's theory can be applied to the 2008 financial crisis, where following his ideas means that the government should have let insolvent banks who lent or invested injudiciously go bust. The government should not bail out these banks since it has proven the point of 'too big to fail' leading to money go on the balance sheet of irresponsible bankers (Flanders, 2012). To conclude, we understand that pumping more money into the economy may leave to further destructions in the long-term and does not fix the boom but create an unsustainable boom. Following the Great Depression, the government adopted Keynesian policy, and yet we had the following credit crisis and the recession indicating that the fiscal policy has set up for the bust to happen repeatedly. Thus, during the pandemic recession, Hayek's case would be to allow economic agents to adjust the economy freely, without intervention. The case would be that as the pandemic improves, demand should increase, and therefore the production will also increase naturally restoring the economy's equilibrium.

However, examples of Hayek's view being politically used was when David Camron took the approach and imposed austerity to pay back the government debt that was built up from the Great Recession. As Hayek said,

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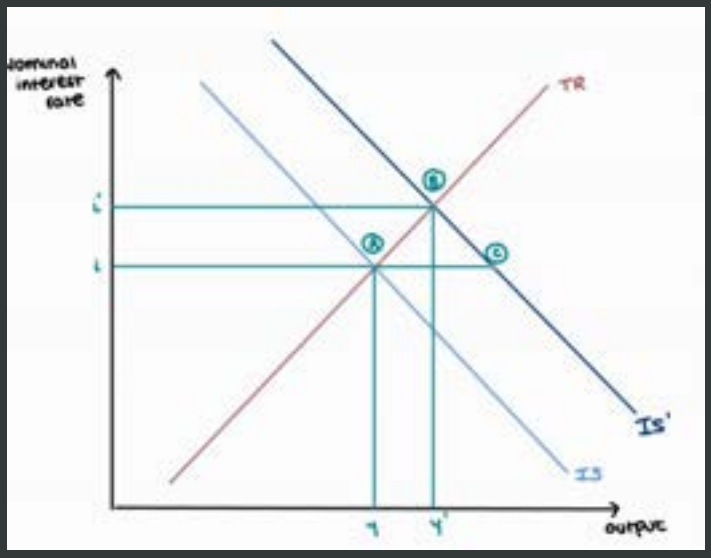
George Osborne raised taxes and cut public expenditure but when was this implemented the recovering economy went into a double-dip recession (Wapshott, 2012).

Keynesian View:

On the other hand, Keynesian suggest that recession reflects periods of deficient of aggregate demand which suggests that the economy is not using its resources. Therefore, to recover from a recession, government spending is vital. He believed that stimulating the economy with an incentive to increase investment and consumption will have a great short-run effect on real output and employment (Papageorgiou, Jahan and Saber, 2014). In Keynes General Theory, he discussed that consumption function is the key part of business cycles. This is further expanded by Richard Khan who developed the multiplier effect, and this suggests that any external input within the economy i.e. government spending will cause a larger change in output. In comparison to Hayek, Keynes also believed that individuals did not have the information to make financial decisions and defined them as 'animal spirits' as an individual are more like to act on their gut instinct rather than be rational. Thus, needed government intervention to restore equilibrium.

As shown in Figure 1, when an expansionary fiscal policy is implanted, there is an exogenous increase in demand resulting in the IS curve shifting right from IS to IS'. This is because, when the government for example increases business grants, for example, it means that these businesses will increase their investment to expand. This will improve employment opportunities, boosting disposable income further adding to the circular flow of income improving the economy leading to an increase in output (from Y to Y').

Figure 1: IS-TR – Fiscal Expansion



However, the IS-TR model also depicts that increasing consumption may not be as effective as changing interest rates due to the crowding-out effect. This is because when the Central bank follows the Taylor-Rule (Appendix B) which says that as output increases from Y to Y' interest rate must increase. Higher interest rate deters

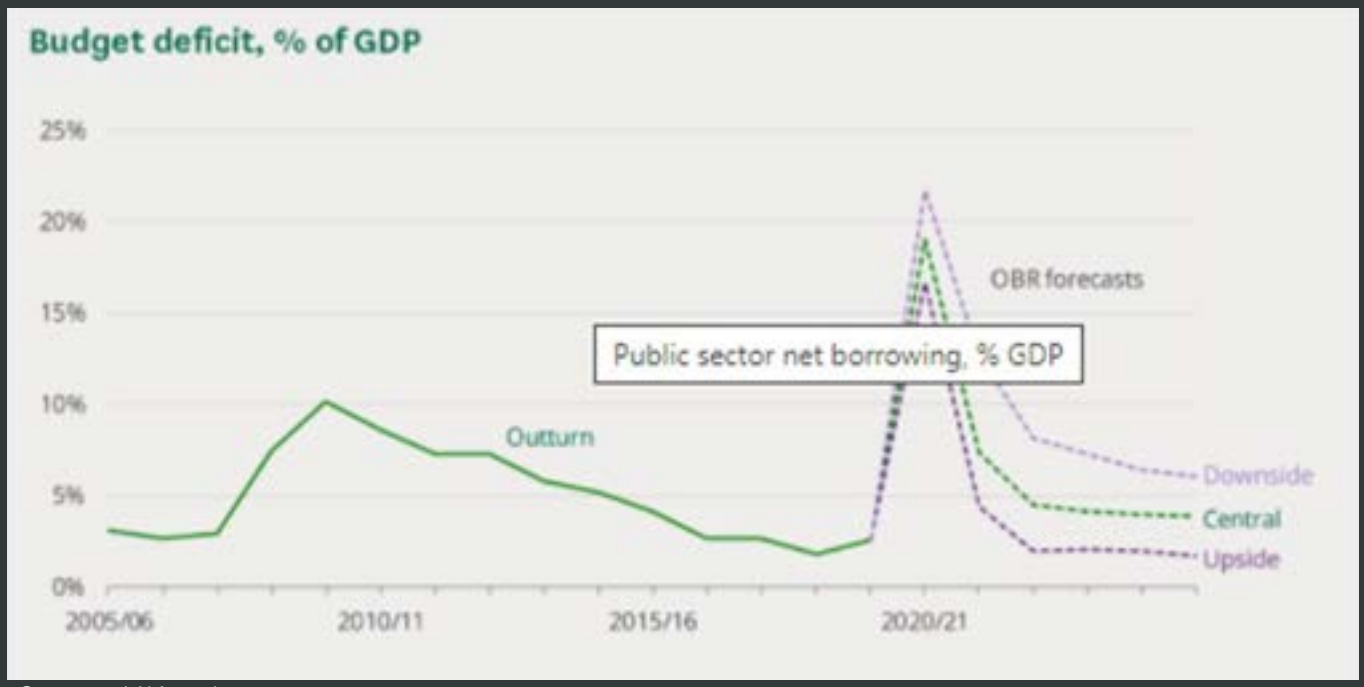
investment and therefore, the output that has increased is crowded out due to lower investment from the higher interest rate. Whilst the Keynesian stimulus is effective to a certain extent, in the medium to long-term the market becomes distorted as Hayek argued.

Budget Deficit and the Pandemic:

The pandemic has caused an acceleration in the fiscal responses across the world. For the United Kingdom, the government implemented a resilience package up to 7% of the GDP (IMF, 2020). To stabilize the economy, there has been support for hard-hit sectors such as tourism and transport. Furthermore, there was the introduction of a furlough scheme which paid employees placed leave up to 80% of their salary.

The UK government borrowing has hit its all-time high in 2020 and 2021 due to the coronavirus pandemic. The OBR has forecast that a budget deficit of £394 billion in 2020/21 which is equivalent to 19% of the GDP (Keep, 2021). In comparison to the budget deficit of 56 billion which was equivalent to 2.5% of the GDP (Keep, 2021). This significant increase accounts for the government's stimulus package to protect workers and businesses. This additional spending is not just pursued by the UK, but across the world to respond to the Covid-19 Pandemic and in Appendix A, you can see the percentage of fiscal support varying between countries with UK, EU, USA, Japan, and Australia whilst low levels of fiscal policy remained in countries in Africa, Mexico, East Asia (IMF, 2020).

Figure 2: The upside and the downside scenario of the budget deficit under coronavirus.



Source: UK parliament

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During this Covid-19, Keynesian theory is implemented since there has been a significant fall in output due to the lockdown resulting reduction in confidence, investment, and an increase in unemployment. Therefore, the government's key focus should be on exploiting the multiplier effect to expand the economy.

Conclusion:

Since the 1930's Great Depression, the Keynesian policy has been adopted across the world, however, only partially – to raise tases and run a surplus in boom times is never implemented despite this being suggested by Keynes. We also haven't seen Hayek's view being considered and implemented since the 1930s during an economic downturn which is to leave the market to itself. To conclude, the government should have a role to play during recessions but to some extent, the market should be left alone. Nevertheless, during the pandemic with there being an increase in unemployment of 4.9% and redundancies reaching a record high of 370,000 in the three months of October 2020 (Office for National Statistics, 2021), it is seeming necessary to approach the Keynesian viewpoint to stimulate the economy to protect people's well-being.



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Appendix A



Appendix B

$$TR: i = \bar{\imath} + a\pi - \bar{\pi}) + b\left(\frac{Y - \bar{Y}}{\bar{Y}}\right)$$

Where:

i is the target nominal interest rate
a shows how quickly central bank react to a change in the inflation gap
b is the parameter which shows how quickly central bank reacts to a change in the output gap
$\bar{\pi}$ is the target level of inflation
π is the actual level of inflation
$\bar{Y}$ is the target level of output
Y is the actual level of output

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ESSAY COMPETITION:

SHORTLISTED ENTRIES





KEYNES VS HAYEK

DIMITRI SCHNEIDER

The economic debates of the 1930s were determined by two antagonists: John Maynard Keynes and Friedrich von Hayek. The crises of the Great Recession in 2008 and Covid-19 revived the discussion about the functioning of economies and about the best recovery policies following shocks.

According to Keynes (and contrary to the "mainstream" economic thinking of his time), full employment is not natural or normal, but one of many possible outcomes. Hence, unfavourable levels of employment do not have to be temporary. The level of output in a country determines the level of employment. The level of output depends on effective demand, i.e. the amount of goods and services that can be purchased in an economy. These purchases can be qualified as consumption or investment. Thus, the level of employment will be determined by the respective levels of consumption and investment (Stewart, M. 1986. Keynes And After. 3rd edition).

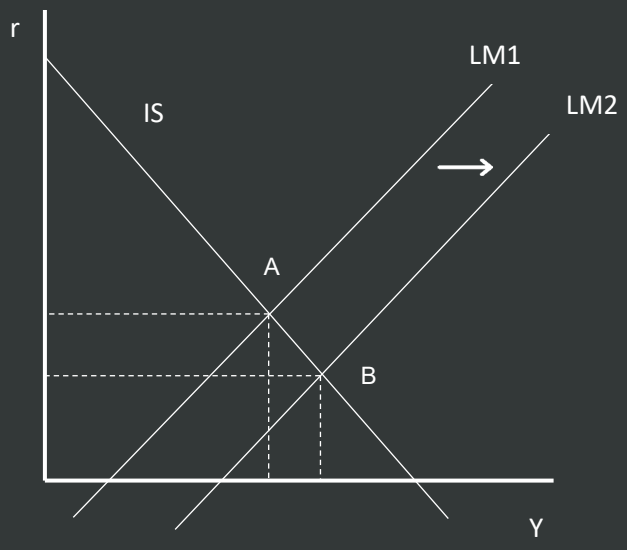
Consumption is mainly done by individuals. It is the sum of their expenditures, which in turn is determined by their income. Investment is mainly done by businesses, it is the sum of all investment expenditures of companies. This depends on profit expectations, how profitable the firms regard the investment to be, which is determined by the expected return on investment and the associated costs. Therefore, what individuals decide to spend on consumption and what companies decide to invest, determines the output, which in turn determines employment. And if the sum total of consumption and investment decisions leads

to an output, that does not require the employment of the whole labour force, then unemployment follows. This level of unemployment will not change until there is a change in consumption or investment. Hence, a heavy, ongoing unemployment is possible and the market forces won't be able to restore full employment (Stewart, M. 1986. Keynes And After. 3rd edition).

Long term slumps are possible, the clearing mechanisms of the market will not work, at least not in the short run. Keynes' solution is for the government to intervene, for instance by means of public investment projects, to increase effective demand and restore full employment (Stewart, M. 1986. Keynes And After. 3rd edition).

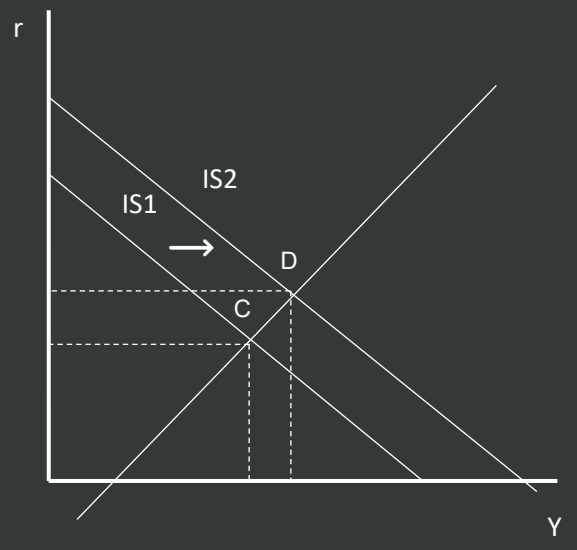
The famous IS-LM model reflects these Keynesian ideas. As stated, in Keynes' view, the markets are not "self-correcting" and following shocks, can "stabilize" at recessive or depressive economic levels for considerable periods of time. Thus, the state should intervene by providing stimulus (accumulating a deficit during downturns, which would be paid down during the economically favourable period). The IS curve represents the goods market, the LM curve represents the money market.

For instance, the central bank increases the money supply. This causes the LM curve to shift rightwards. The new equilibrium will have a higher output and lower interest rates. The increase in money supply is supposed to lead to falling interest rates, thus stimulating investment and a rise in national income, until the new equilibrium is found (point B in the following graph, from the starting equilibrium at point A). Since interest rates in many developed economies are around zero levels, this policy appears to have lost much of its affect. Also, continuous steering of the economy through money printing arguably will not help increasing the productivity of labour or capital.



The government can also implement fiscal measures. Increasing government purchases affects the IS curve, which shifts to the right, with the new equilibrium at higher output and higher interest rates (point D from original

point C in the graph below). Increase in income leads to an increase in money demand, eventually pushing up interest rates. This crowds out some of the potential increase in output due to lower investment caused by the higher interest rates.



The central bank can accommodate the fiscal expansion and keep the interest rate "fixed" by increasing the money supply. The slope of the LM curve determines the size of the fiscal policy multiplier. A very steep LM curve would lead to a very large crowding out effect, i.e. increases in government purchases would lead to high interest rates and much lower investment. A flat LM curve at the zero lower bound would have the exact opposite effect - the government purchases fiscal policy multiplier would be larger and there shouldn't be crowding out by lower investment.

In his speech to the National Association for Business economics in October 2020, the US Federal Reserve Chair J. Powell, said:

Even if policy actions ultimately prove to be greater than needed, they will not go to waste. The recovery will be stronger and move faster if monetary policy and fiscal policy continue to work side by side to provide support to the economy until it is clearly out of the woods.

Mr Powell appears to follow the Keynesian view. However, at the zero lower bound, expansionary monetary policies to stimulate investment arguably lose their effect, but (also arguably), the Keynesian fiscal policy multiplier is higher when the economy is in a liquidity trap.

Keynes' revolutionary insight was that the economy is not self-stabilizing, at least not in the short (enough) run. It can stay in a recession or depression for a long time, just as the Great Depression proved. Keynes' solution was the stimulation of demand, which will lead to full employment and growth. Keynes' theory arguably is a recipe for an economy in a deep, ongoing slump and deflation. It is not a tool for the permanent fine-tuning of the economy.

Hayek's view appears to be a stark contrast to Keynes. According to Hayek, the supply side of the economy is crucial. The culprit is not the lacking demand but the malinvestments of the boom, i.e. easy money and proliferating credit growth, a misallocation of assets in general.

Hayek offered no recipe for a timely solution of the crisis. He definitely did not advocate Keynesian fiscal stimulus measures. Hayek suggested that Keynesian fiscal stimuli would have little and temporary effect on the aggregate demand but be harmful to the supply side. In his view, government interventions made the financial system unpredictable and unstable. In Hayek's opinion, the role of the government was restricted to providing a stable regulatory framework, which would secure fair competition, low taxes and a balanced budget. Hayek accepted the cycle of booms and busts as inevitable in free markets and as a fair price to pay. The free markets would clear the debris of the crisis, i.e. the unproductive elements that caused the crisis – a painful, but necessary healing process, that can take a considerable amount of time.

Hence, Hayek would favor austerity measures, cuts in wages, tax cuts, easing of regulations and a return to higher interest rates to encourage savings (instead of consumption), according to Hayek crucial for productive development. The crisis would force businesses to fix their balance sheets, becoming more risk averse and ceasing deploying investment for unproductive or speculative purposes.

In my view, Keynes offers a better policy for "anti-slump" measures in the short run, while there is a number of Hayekian policy tools that can be implemented in the long run, after the crisis has been alleviated, which will also help to reduce budget deficits. I see no convincing reasons to wait for the markets to clear or to implement broad austerity measures. In both cases, the resulting hardship and damage to the economic growth are very real and considerable.

However, a recent study indicates that there might be a long-term shift of consumer demand preferences, which should be "a warning against maintaining broad-based horizontal fiscal support for an extended period". According to the authors, unproductive companies should leave the market and the stimuli to focus on the sectors that better reflect consumer demand. As stated, the fiscal stimulus should be applied for a relatively short period of time and as much as possible for productive purposes.

DIMITRI SCHNEIDER

According to OECD, public investment has the largest (Keynesian) multiplier. For instance, after government spending on large scale, labour-intensive infrastructure projects (which are indeed required) or tax cuts refuels demand, improving long-term economic framework with some of the policies suggested by Hayek, can be beneficial. Removing as much unproductive activity (e.g. "zombie companies") from the economy as possible together with targeted easing of overregulation to make it easier to start and run small businesses is paramount. Quantitative Easing as means of stimulating economic "growth" should be reconsidered and the return to normal level of interest rates should be initiated – all Hayekian policy considerations to increase the productivity of the economy in the long run. Moreover, I think Keynes and Hayek would agree that education is of the outmost importance as well as efficient (re) training in currently demanded skills, especially of the unemployed work force.

In my view, flexibility and adaptability will be very important to assure a quick and sustained recovery from the Covid-19 crisis.

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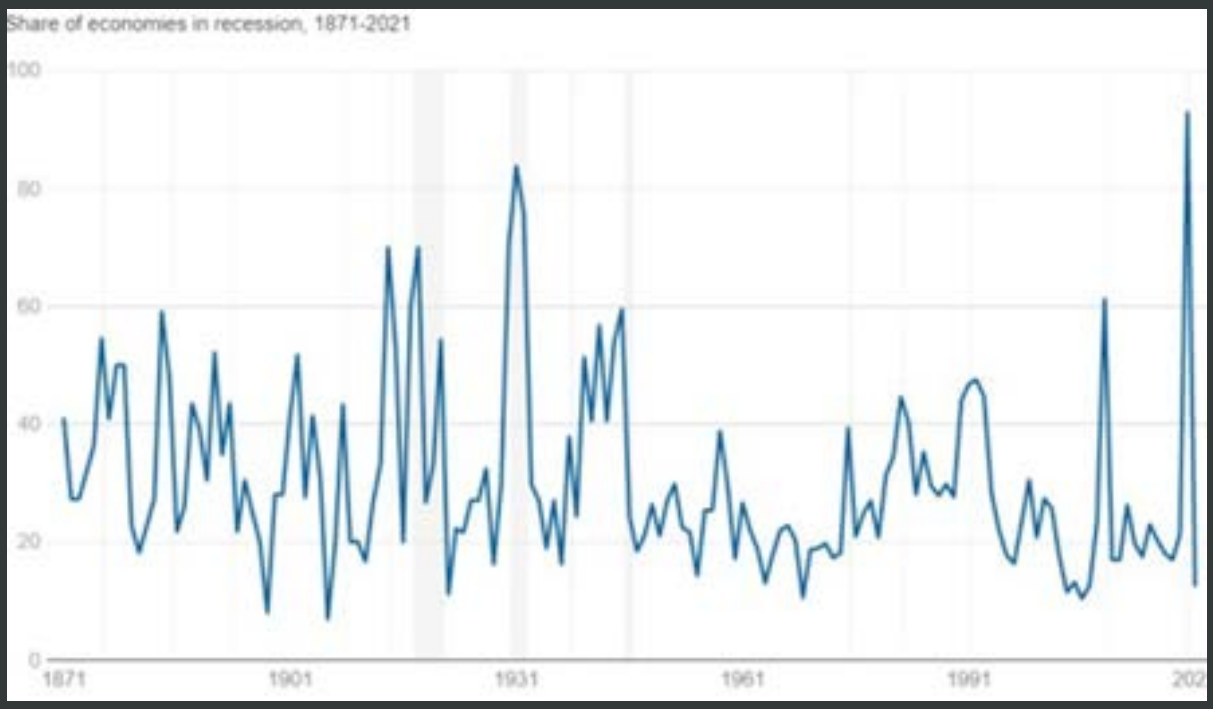
KEYNES VS HAYEK

WILLIAM BROWN

Impact of COVID-19

The impacts of COVID-19 have engulfed every economic indicator used to identify success. There has been a historic contraction of global GDP, with a prediction of a 5.2% contraction worldwide (World Bank, 2021). Leading to a record high number of countries to simultaneously be in a recession. More pressingly, a slowing of potential output, reducing productivity growth gains, especially in developing countries. Consequently, there have been unprecedented levels of government activism in an attempt to curb the economic losses caused by the virus and the economic shutdown. Completely new and "original" policy measures are being implemented in order to alleviate demand contractions and soften the blow of long-term scars caused by a reduction in private investment, and the erosion of human capital progress due to reductions in schooling and employment opportunities. During times of financial crisis, the debate arising on government intervention always seems to present itself, particularly on the influence of the fields of Keynesian and Austrian economics, two fields pioneered (Keynes) and evolved (Hayek) in the 20th century by John Maynard Keynes and Friedrich Hayek with strictly opposing views. Keynes being the forerunner of government spending and the multiplier effect during the great depression, with Hayek having a more limited approach to the governments hand, building on Smith's conception of the free market guiding people's actions (Smith, 1776). After the 2008 crisis, the work of these two great minds was called upon again in order to influence policy

Figure 1: World Bank 2021



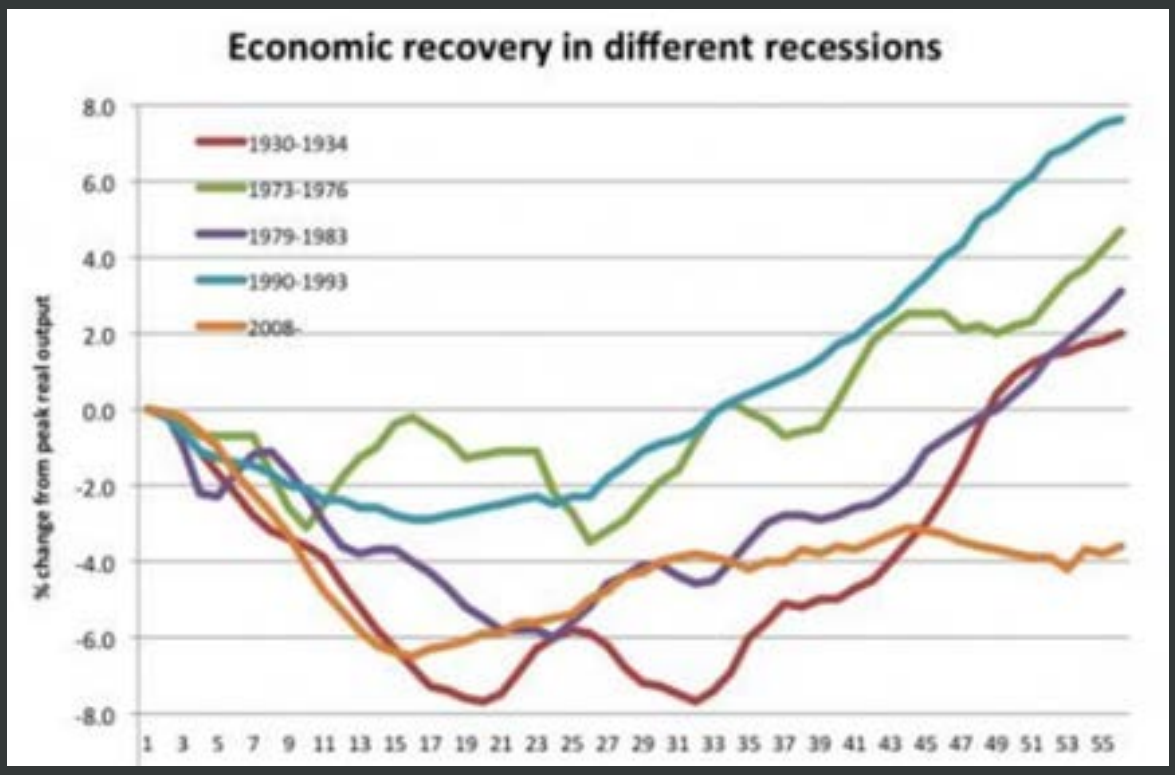
decisions tasked with reducing unemployment, promoting growth whilst limiting inflation. After historic reductions in growth and employment rates, it seems the debate has arisen once again, and allows us to ask which of these key economic thinkers would have had the best response to the aftermath of the COVID-19 pandemic as governments seek to shift to recovery mode in the coming months.

Use of Keynes and Hayek in the 2008 Financial Crisis

In the aftermath of the 2008 crisis, the government implemented contractionary policies in the form of a V.A.T cut, promoting an increase in demand. In addition to this, there was a widespread use of quantitative easing, increasing the money supply in the economy whilst simultaneously reducing base interest rates.

Unfortunately, the UK exhibited the slowest recovery from a recession on record (figure 2), with a combination of poorly executed policy ideas and the Eurozone crisis promoting fiscal austerity. Keynesian thought was reintroduced into mainstream policy decisions. The UK also brought forward £3 billion worth of investment spending forward from 2010. Hayek was strongly against all uses of short-term discretionary fiscal stimulus measures, stating they are the antithesis of predictability (Hingstman and Goodnight, 2011).

Figure 2: National Institute of Economic and Social Research, 2019



Most notably, the UK bailed out struggling banks, limiting its ability to take further fiscal measures to get the economy back on track – at this point national debt was over 80% of the UK's GDP (HM Treasury, 2009). This hindered the UK's ability to achieve any kind of economic revival before austerity measures were introduced, limiting the capacity of Keynesian "pump-priming" demand. As a consequence, the UK had an extremely low recovery rate, interest rates never recovered to pre-2007 rates, limiting the scope of monetary policy, and demand failed to meet previous levels, leading to many years of slow growth.

Pathway to COVID recovery

Much like in the 2008 crisis, the UK and the US have executed a discretionary short term fiscal stimulus, with the US providing cheques to every citizen earning under $75,000, with the objective of boosting demand. The UK implemented their fiscal stimulus through business grants and furlough schemes, aiding the reduction in unemployment whilst aiming to boost demand. Although these seem like pure Keynesian measures, Keynes and Hayek were both opposed to direct fiscal stimulus. Keynes proposed fiscal stimulus in the form of funding large-scale infrastructure public works programmes, which spreads the risk of the investment. For example, if the money paid in wages to the workers gets held up with a high

marginal propensity to save, there are still gains in infrastructure through the public works programme, this could mean better roads, or improved public transport, which may contribute to domestic productivity. If the payments get held up in savings as people are uncertain about the longevity of COVID-19, which is likely according to Friedman's permanent income hypothesis[1], there is little to show for the measure, with little multiplier effect or infrastructure improvements.

Unfortunately, one of the main reasons for Hayek's lack of popularity is down to the fact his approach is very hands-off, which limits political popularity in many respects. He is a strong believer in the free-market and outlines the role of the government as a provider of the basic necessities so every man and woman can have shelter, food, water, and education. Therefore, if he was alive today, he may have been a supporter of Universal Basic Income, and after that, the government lets the markets play out. In part, the furlough payments are a form of UBI, and therefore Hayek may have supported this. However, he stated that any gain in aggregate demand because of direct stimulus is likely to be offset by shortcomings in a diminished aggregate supply.

Austrian economics criticised Keynesian's multiplier effect[2] , stating that the impact was much less prolific than stated. However, a detailed review by Baum et al. (2012) identifies that the impact of fiscal multipliers differs across G7 countries, dependent on their position in the business cycle. Fortunately, his findings show a non-linear relationship between the effects of fiscal expansions and economic activity, identifying a more extensive effect during periods of economic downturn, which fits Keynesian's predictions, and would be a justification for fiscal expansion in the current climate. the business cycle. Fortunately, his findings show a non-linear relationship between the effects of fiscal expansions and economic activity, identifying a more extensive effect during periods of economic downturn, which fits Keynesian's predictions, and would be a justification for fiscal expansion in the current climate.

The use of discretionary fiscal stimulus packages rests heavily on the outcomes of Friedman's Permanent Income Hypothesis and the expectations of the receiving public about future fiscal policy, and the future of the economic climate. As we know, a consumer's permanent income is given as a combination of physical and financial assets, as well as human capital, which all influence an individual's ability

to earn income. If individuals are expecting future tax rises and a slow recovery from the pandemic recession, it is likely that marginal propensities to save will increase, for the following two reasons: (1) They may not have job security and (2) the opportunity to support aggregate demand is limited to supermarkets and online retail, limiting spending.

It is clear Hayek's shortcomings come in the form of a lack of action when an economic bust occurs, as his theory works on the basis that a bust will reallocate resources according to the market and is an indication of future market conditions. For example, one of the biggest losers in the pandemic is the high street, with footfall reducing due to restrictions. These businesses are being supported by the government through business grants and furlough pay for the workers. Hayek would say that this is artificially indicating that the high street is doing better than it is, as between 2012 and 2017 the number of businesses on the high street fell by 2%, with a fall in 6% of high street employment at the same time (ONS, 2019). Therefore, if the high street is being propped up, Hayek believes that it could lead to future investment in a failing industry. Likewise, between 2012 and 2017, employment in the Food and Drink sector on the high street rose by 20%, with these businesses suffering from the reduced demand due to restrictions, they will receive the same financial injection as the failing businesses, yet they are predicted to continue to be successful in the future (given the pandemic subsides). It is worth noting that Hayek's theory mainly applied to economic downturns which were not caused by an unprecedented shutdown of many services - however, it is clear that he was against propping up failing businesses, and that any injection in aggregate demand would be offset by a failing in.

Conclusion

After an extensive analysis into the works and thoughts of these two great economists, it seems that Keynes' would provide a popular and suitable approach to this unplanned shock. Hayek's hands off approach may be effective in the easing of inflation which may occur after the stimulus has been distributed throughout the economy, but is likely to cause a much deeper recession, with millions still in furlough propping up demand and maintaining effective supply levels. As a firm believer in the power of the business cycle, Hayek is likely to leave many areas of the economy to its own devices, which would leave it lagging behind other countries in demand and competition. It is debated that the Keynesian approach is in

place now, with some unprecedented amendments, not even reminiscent of the Spanish flu in the 20th century.

Unfortunately, what started out at the beginning of writing this as a short-term shock, is developing into a full blown recession, approaching the longevity of the 2008 crisis, whilst likely to exhibit similar long-term issues. A more extensive review into fiscal and monetary policy may provide a more cohesive argument, with the likely outcome of a combination of Keynesian and Austrian thought, where the Austrians focused more on short-term monetary policy, a key element in the 2008 recovery. The decision mainly lies on where the financial priorities lie and whether a government budget deficit is the preferred opportunity cost of eliminating such large demand shortages and unemployment[3].



Footnotes

1. Friedman hypothesised that households' spending decisions were based mainly on their expected sustainable income rather than short-term fluctuations. So, a cash stimulus would not all be spent as the households expect a future tax rise to cover it.
2. The idea that a modification in the level of government spending will have a more than proportional impact on real GDP levels.
3. And all the issues which go along with it.

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POSTER COMPETITION:

PRIZE WINNERS

1ST PLACE:

ANN MOHAMAD



BEHAVIOURAL CONCEPTS ON COVID-19

ANN MOHAMAD

The behavioural economics insight on the shifts in UK consumer behaviour during the pandemic

COVIDNOMICS

Written and Designed by Nur Hasseenah Bt Mohamad

INTRODUCTION

Why did people stock up on toilet rolls? How have we become more health-conscious? How did COVID-19 accelerate the adoption rate of the internet in older people?

These are the few questions orthodox economics can't quite explain because it requires a deeper analysis into the human psyche and the irrationality that exists in real economic agents.

In this poster, by working closely with Thaler's works in the behavioural economics field, we will utilize concepts such as decision heuristics and the dual-process theory in order to interpret the shifts in UK consumer behaviour arising from the pandemic.

1.STOCKPILING

Percentage of UK Consumer Segments Emerged during Pandemic, sourced from EY Consumer Index, 2020.



However, before lockdown started, there were people who were panic-buying **excessive** amounts of groceries. The hoarding of toilet rolls in amounts beyond what is required in the short-term cannot be justified as simply 'preparing' for lockdown. Especially when **none** of the symptoms of coronavirus entails any form of **bowel problems**! So **why** were people stocking up on them anyways?

Let us introduce the **'Anchoring and Adjustment'** from Thaler-Sunstein's Nudge. This decision heuristic is when a person uses a known/comparable fact and adjusts it to decide about an **unknown scenario**. This unknown scenario is the first lockdown. People have not lived through a major pandemic and do not know how to react in that situation. Everything is changing and we are forced to adapt to a 'new normal', which can be daunting if not panic-inducing.

We can also say that in such a situation, **System 1** 'automatic' thinking will overpower **System 2's** 'reflective' thinking. So, in order to cope with the **ambiguity** of the pandemic (regarding the true nature of the lockdown and its length), consumers may anchor to past events that emerge whenever there is a crisis in Britain, such as the invocation of the Blitz Spirit.

Therefore, they **adjust their shopping behaviours** to that of a doomsday scenario.



Decision Heuristic

Simple strategies or mental processes that humans, animals, organizations and machines use to quickly form judgments, make decisions, and find solutions to complex problems

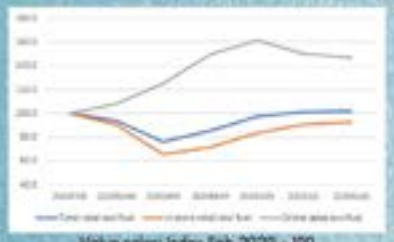
Dual Process Theory

How thought can arise in two different ways during decision-making processes:
System 1 – more intuitive and emotional
System 2 – more deliberate and self-conscious

Consumer Behavior Changes

2.SHIFT TO ONLINE SHOPPING

Value sales, seasonally adjusted, UK, February to August 2020



Value sales: Index Feb 2020 = 100

Source: Office for National Statistics - Monthly Business Survey

The line graph illustrates the increase in online sales throughout 2020.

38% of respondents did more online shopping relative to pre-lockdown levels

Source: Deloitte, 2020

This is because of:
- convenience
- safety reasons (to curb the spread of the virus)
- pent-up demand for discretionary spending

How can behavioural economics explain this shift in behaviour? Since most people's work and education has moved online, internet has doubled in the UK (BBC, 2020). As more and more people get used to the landscape of the World Wide Web, more people seem to **ease into** the idea of online shopping.

Nevertheless, deeper analysis suggest that this may be influenced by the **'Availability'** heuristic. Availability tells us that the **greater the familiarity** of something, the greater the perceived frequency, and also the greater **sense of trust** in its validity. The familiarity UK consumers have to the internet may have influenced their **adoption rate of online shopping.**

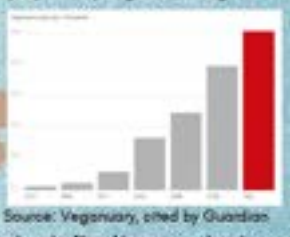


In addition, the **'Conforming'** heuristic (whereby in fear of isolation, consumers tend to follow the crowd in terms of buying decisions) in the form of **network effect** and **online reviews** can also explain the shift to online shopping and increased internet use in UK consumers. Indeed, the surging need of e-commerce has boosted the adoption rate and lubricated the **normalization of once-feared technology.**

3.INCREASED HEALTH AWARENESS

2 out of 5 believe that health and wellbeing will be one of their three most important post-pandemic purchase criteria Source: EY, 2020

Bar graph of people who pledged to eat vegan in January 2021



Source: Veganuary, cited by Guardian

What are people doing?
- Purchasing products to boost their immune system
- Following a plant-based diet
- Using more environmentally-friendly products
- Buying more fresh fruits and vegetables
- Participating in at-home workouts

This change in behavior can be attributed to the **'Fear'** heuristic, whereby people fear certain things enough to **divert** their actions away from it. For instance, they are afraid of **mortality**—both by Covid-19 and global warming. The **availability** heuristic is also seen in the role of **media** via hard data and statistical evidence of the dangers of the virus. Besides that, slogans such as 'Save Lives, Protect the NHS'. Moreover, this shift in behaviour can also be explained by the **conforming** heuristic, whereby people will often get **shamed** by not abiding social-distancing and mask-wearing rules in public. This will prompt people to **avoid** breaking any pandemic rules out of fear of isolation and embarrassment.

COVID ACROSS THE GLOBE

Source: McKinsey

Chinese consumers are approximately **64%** more optimistic than the country's economic conditions after Covid-19

- Chinese consumers intend to **spend more** on discretionary items compared to UK consumers who intend to cut back spending on most categories.
- There was **moderate online growth** in China compared to the substantial increase in the UK as the country had high levels of online penetration **before** the virus outbreak.

Most impacts of COVID-19 in the UK are similar to that of the US.

- In 2020, consumers report a **higher intent** to spend across categories in preparation for festivals towards the end of the year.
- Indian consumers are **more optimistic** regarding the economic outlook

Germany reports **13%** less respondents who have tried new shopping behaviours since Covid-19 than in the UK.

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2ND PLACE:

ASHINI SHAH

KEYNES VS HAYEK

ASHINI SHAH

1. ECONOMIST VIEWS

- John Maynard Keynes - Concerned with maximizing demand in economy and reducing unemployment – with focus on Short term goals at priority
  - Famous following Great Depression – 1930 and post WW2 – Contrasts neoliberal economists that have beliefs that government intervention have little impact to smooth the downturn.
  - Had little response to stagflation post 1970's
- US responded by Economic Stimulus Act 2008 & American Recovery and Reinvestment Act 2009
  - The U.S. Federal government - $787 billion in deficit spending in 2008 crisis (Economy = -6.4%)
- Hayek – Does not believe in **Monetary + Fiscal** approach - Social Theorist
  - Return to sustainable production

"The danger of tyranny that inevitably results from governmental control of economic decision-making"

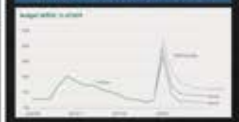
ALTERNATIVE ECONOMIST VIEW:

Friedman (1969) - argued concept of 'de facto Helicopter money' – unconventional monetary policy [Money is printed and distributed to stimulate consumption - in liquidity trap. Particularly aiding when 45% of Americans after 3-months can no longer afford living expenses.

- *Netherland* 1988 [Zalmmnip] = No stimulation.
- *Hong Kong* [Covid-19] HKD10,000 to revive the economy -may be an option by the UK government.

6. HOW ECONOMY HAS RESPONDED in COVID-19

OBR Forecast:
£394Bn (19% GDP)
Vs
£56Bn (2.5% GDP) - 2019



1

1. £124.3 billion of programmes, initiatives and spending commitments.
2. $190 Bn Bank lending

2

1. Monetary Policy – Cutting interest rate from 0.75% to 0.5% to 0.1% = Cheaper lending to businesses
2. QE - £895Bn

-20.4 % in 2020

Proposal:

The recovery from the depths of uncertainty, loss of business confidence as well as our macro-economic indicators will take a long period of time, and different instruments such as lower interest (Monetary), higher government spending at 0% and policies such as tax reliefs (Fiscal) will be needed to prevent a recession and recover from the loss of GDP, from the unprecedented events to our global economy.

Largely agrees with the Keynesian view, but can implement monetary policy – however, ineffective to lower interest rates further at the zero-lower bound.

Evaluation:

Rational expectations Some economists argue that people look to the future and see a tax cut as only temporary, and therefore don't spend. Instead, they save the tax cut in anticipation of future tax rises.

5. TRADITIONAL THEORY

KEYNES	HAYEK
Keynes suggested the Federal Reserve work with the national banks of England and France to restore confidence in the international long-term loan market (White 2012)	Market The market is able to correct itself by taking advantage of competitive forces
When the demand for goods and services falls, = (-) income. When the income of the companies declines, they are forced to (-) production and thus, (-) their workforce, = layoffs.	Government/ Central Banks: A cause of further instability rather than restoring growth .
'General Theory of Employment, interest & money' *"Animal Spirits" = Not produce outcomes of a weighted average of quantitative benefits multiplied by quantitative probabilities.*	Laissez-faire Individuals are rational beings with power to make decisions that best affect themselves.
Mechanisms: 1. [MICRO] INEFFECTIVE – Wage and Price adjustments to restore growth	Government spending would mainly delay adjustment process and postpone recovery – a view also held by US Sec Treasury during Great Depression.



2. FRIEDRICH HAYEK THEORY & RESPONSE

THEORY – Business cycles in Prices and Production

Markets create price signals and incentives to orientate the economy most efficiently

LIMITED ROLE OF THE GOVERNMENT

METHODOLOGICAL INDIVIDUALISM:

- All economic phenomena stems from freely chosen actions by agents
- **Global, historical, social forces** determine economic outcomes from a downturn.

RECESSIONS: **REFLECT LIQUIDATION** – accumulation of capital goods.

- Recessions = 'Necessary evil by periods of liquidation

BOOM/BUST CYCLE:

1. BOOM – Lower interest rates create cheap credit – distorted price signals
2. BUST – Return to equilibrium

MONETARY + FISCAL: Unsupportive of Quantitative Easing by Federal Reserve & Central Banks pumping money into the economy

'Let the system heal itself'

HANGOVER THEORY:

1. Paul Krugman (1998)
2. Liquidation of capital goods causing recession = depressed spending and investment [MALINVESTMENT]

END GOAL:

Whilst Keynes thought wealth was the end goal, Hayek believed 'and the real goal is production of *Jobs are a means, not the end* goods/services that consumers want. Money is only a tool.

Some considered this to be an appropriate description of the Asian crisis of 1997 and of the two most recent US recessions.

3. KEYNESIAN RESPONSE

IS-TR MODEL → The model evolved from Keynes IS-LM model by Hicks

- [EXPANSIONARY FISCAL POLICY] Suggests by increasing government spending/cutting taxes = IS1 → IS2 which increases the national output levels from Y1 → Y2.

BENEFIT:

- No crowding out from increased interest rates and lower investment spending
- Full use of the multiplier effect
- Further production by firms increasing employment
- Further income → leads to increasing spending and desired demand

$$\Delta Y = \frac{1}{(1-c)(1-z)}$$

EVALUATION:

- Despite the fiscal deficit, government spending is effective as long as [G-R > 0] [Real growth > Real Interest Rate]
- [G-T > 0 = Budget Deficit] will allow stable equilibrium which in long run reduce debt-GDP ratio
- Many economies in 2008-13 showed recovery to fiscal expansion – however reversion to austerity (HIGH GOVERNMENT DEFECIT) due to deficit caused double dip recession

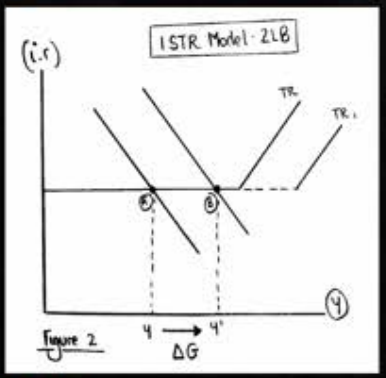
Post-lockdown Covid-19 - Strongly discouraged to perform austerity to lower the budget deficit alike Financial Crisis. Causes opposite effect and reduce Y – worsening current recession.

4. FISCAL RESPONSE ON ZERO-LOWER BOUND

Further debt financed spending whilst at 0% interest rate:

Long run fiscal expansion of economy

- At zero lower bound – Horizontal= Fiscal policy is effective and makes full use of the multiplier effect
- Monetary policy ineffective at ZLB, by shifting TR due to the perfectly elastic curve (Cash + Bonds perfect substitutes)



"For the engine which drives enterprise is not thrift, but profit." - *'A Treatise on Money' (1930)*

University of East Anglia

Fiscal response to the pandemic recession and approach best suiting the current situation

Ashini Shah

3RD PLACE:

GEORGE BARHAM

KEYNES VS HAYEK

GEORGE BARHAM

RECOVERING FROM THE PANDEMIC:

A FISCAL REPONSE FROM J. M. KEYNES & F. HAYEK



John Maynard Keynes 1883-1946



Friedrich Hayek 1899-1992

The Coronavirus Pandemic has forced hardship on millions around the world. Various lockdown measures have halted economic activity in most areas, resulting in job losses and bankruptcies for firms. In April 2020, the UK entered a technical recession, when GDP fell by a record 20.4% (ONS). All governments face a crucial question in responding to these difficulties: How far should they intervene in the name of recovery? We will explore this topic in this poster.

The Scale of Government Intervention



So the question to answer is: Where should the UK sit on the scale of government intervention when responding to a pandemic recession?

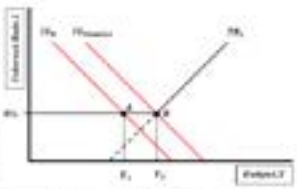
THE KEYNESIAN RESPONSE

The Keynesian view is that the markets **aren't efficient.** A recession occurs due to too much saving, thus putting downward pressure on Aggregate Demand. The government can intervene with Fiscal & Monetary Policy to 'fill the gap' when firms stop spending. This is a pro-government argument.

1 Keynes' turned the classical view on its head, noting current expenditure = current output. He argued for demand management, by using discretionary fiscal policy - Government invests in works such as infrastructure, in order to boost demand and stimulate employment. This stimulus is designed to bring the economy back to equilibrium, by focusing on achieving full employment.

We see the presence of a liquidity trap in the pre-recession economy of the UK - with low interest rates failing to stimulate demand. UK consumer confidence trended around -10 pre-pandemic, but fell to -35 in April 2020 after lockdown measures were imposed.

2 Using the IS-LM model, we can see a stimulus shift in the Investment-Saving line will bring the Economy from Y1 to Y2. The economy benefits from the full stimulus as interest rates sit at the Zero Lower Bound (ZLB) of 0%.



3 The stimulus benefits from the multiplier effect, where the final GDP boost is higher than the stimulus due to unused resources. This also ends the "glut" of unused savings built up by the private sector during a recession. The result is higher confidence and a recovery in aggregate demand.

* There are however, a few 'holes' in Keynes' stimulus arguments:

- Fiscal fine tuning is very difficult - governments lack the information to make fully informed decisions.
- Larger stimulus = larger state, and a larger state = more corruption. This inefficiency could negate the positive benefits of the multiplier altogether.

Estimates of fraud in the UK Civil Service range from £31bn to £48bn, which is 3-5% of total spending.

- The breakdown of the Phillips curve in 1970 was caused by a combination of rising unemployment and inflation - coined as stagflation. This broke the link between employment and inflation, and led to a resurgence in supply-side economics.

4 The UK has a structural lack of investment in transport and housing, which is a significant drag on the UK economy. If the government were to invest in these areas, it could lay the foundations for a solid economic recovery, where employment is increasing, and confidence is recovering. The large QE programme from the Bank of England ensures that rates will be low, and thus government spending will not cause a drag on private investment either.

Investing in new infrastructure could also promote the environment - with electric charging points on motorways, better rail infrastructure such as Crossrail & HS2, and better insulation for low-income households all contributing to a reduction in CO2 emissions. With the right decisions, this would help reduce the UK's productivity gap between London and the rest.



THE HAYEKIAN RESPONSE

Hayek saw the markets as **efficient.** His Austrian approach took into account the fluctuations of the business cycle - where the private sector reduces spending due to economic imbalances, and thus viewing recessions as a necessary evil. During the boom, assets are mispriced, and the capital structure is distorted. Hayek would argue that an artificial boom was created due to monetary expansion, and thus must end in a bust. This is the anti-interventionist argument.

1 Before the pandemic recession, money was too readily available with interest rates at 0%. This distorts investment decisions, and thus risky decisions are taken. These decisions result in non-efficient products that are made and sold, resulting in wasted capacity. With cheap credit, short term investments are also sacrificed for longer term capital investments, which hurts the economy in the short term.

To finance fiscal policy, governments have to take money from productive firms, thus sacrificing economic growth. This central planning interferes with responsibility, and causes a greater reliance on the "nanny state". A key part of Austrian economics, is the belief that no individual (gvmt.) can make rational economic decisions for a group of individuals (the UK), as the market is complex in nature.

* There are however, a few 'kinks' in Hayek's chain of reasoning.

- There are examples of market failure, such as the sub-prime mortgage crisis of 2008, which disprove market efficiency.
- Leaving a recovery to market forces may take a long time if general confidence doesn't quickly recover.

2 High unemployment and low interest rates are a sign of idle capital being reallocated. The Government lacks the knowledge to allocate these resources, and thus must reduce barriers to enterprise. Government should cut their spending and reduce taxes/regulation. This allows the price signals of profit, loss & prices to function, as well as ensuring there is no crowding out. This avoids an artificial recovery/boom, and ensures a sustainable level of growth. It may take months for the economy to reset, but it is necessary for the chain to function in the future.

3 The recent boom and bust of 2008 was a result of artificially suppressed interest rates and capital flows, which caused an inefficient allocation of resources. If the UK adopted sound money with laissez-faire principles, it would have created a sustainable rise in the productive capacity of the nation. Central Banks wouldn't be able to erode the value of money by creating inflation - it would be up to the market to determine the interest rate. As markets are efficient, this would ensure efficient investment decisions. This would also quell the inefficiency and corruption which are apparent in all centrally-planned bodies.

4 Before the advent of Keynesianism, most recessions were short-lived and resulted in a bounce back to equilibrium in the following year. The inclusion of government may restore confidence - but at a long term cost to the nation. Businesses which are 'bailed out' distort the profit/loss mechanism - therefore there should be no support of this kind as it encourages the wrong behaviour. Instead, the conditions for a healthy market should be met:

- Move to sound money and free banking, where interest rates are set by the market.
- Reduce government spending, and allow the private sector to choose what is best.
- Reforming the tax system to remove all deductions, and lowering the rates with the money you gain from removing deductions.

WHICH RESPONSE SUITS

The Situation

- Aggregate demand is low due to lockdown measures.
- The UK unemployment rate reached 5.0% in the 3 months to Nov 2020.
- Consumer confidence is negative, but increasing to -23 in February 2020 with news of the rapid vaccine rollout and graduated easing of restrictions.
- As of October 2020, private debt was £205.5bn (Bank of England), but is decreasing over time, due to a savings glut from staying at home.
- Government debt reached a 50 year high in December - at 99.4% of GDP.
- The Bank of England cut its base rate of interest to 0.1% in April 2020.
- UK economic growth was -9.9% for the year of 2020.
- The CPI was 0.8% for 2020, and is predicted to rise to 1.2% in 2021.
- Income inequality has been rising since 1970, with a Gini coefficient of 34.6 currently (ONS).
- One in five companies in the UK is a "zombie" with profits barely covering debt interest payments (Onward, 2020)

THE CURRENT SITUATION?

The Best Response

Due to the factors present, adopting a **Hayekian** response is the best route forward, restoring free market principles and allowing price, profit and loss to adjust properly to the market conditions. The UK should sit between 0 and 50 on the scale of intervention.

- Sound money

Utilise the latest cryptocurrency technology, by transitioning to a Bitcoin based currency which is deflationary in nature. This would restore purchasing power, encourage good savings behaviour, reduce unsustainable bubbles and lead to a more equitable spread of wealth. There would be no Quantitative Easing, which has led to asset bubbles, zombie companies and inequality.

- Reducing the size of government

A smaller, and more fiscally responsible government will increase trust in the nation, allowing for higher levels of foreign investment. There will be less crowding out, as more credit is available for the private sector. The market will ensure that productive investments are made, such as in new renewable electricity technologies.

- Reforming taxation

Replace the bloated 17,000 page long tax code with a simple flat tax of 20% of all income - which would increase the tax base, close loopholes, and make for a fairer system. No more inefficient siphoning of tax money through loopholes and deductions which are a drag on public finances.

NEP

By George Barham • 2021

ANNOTATED ESSAY:

THE RATIONAL ADDICTION MODEL



THE RATIONAL ADDICTION MODEL

Microeconomics has its foundations in the law of demand - where the quantity of goods demanded is assumed to be price elastic; however, addictive consumption questions this by considering whether prices do matter. By re-evaluating the elasticity of demand, we question whether addictive consumption is a rational choice, as consumption, regardless of price, does not maximise an individual's utility. This essay will introduce the economic imperialist view of rational addiction and dispute whether Neuro-economics and economic psychology's insights challenge the belief that addiction is a rational choice.

A great way to end the introduction is with a clear purpose for the essay, just like this! It gives clarity to the reader and sets a clear focus for you to refer to during the rest of the essay, this will also make the essay easy to follow.

Consumers respond differently to 'normal' and 'passion' goods. While the demand for normal goods is assumed to be price elastic, passion, or addictive goods, present inelastic demand **(Figure 2)** when consumed by addicted individuals; giving notion to a kinked demand curve.

Punchy opening to the paragraph/point!

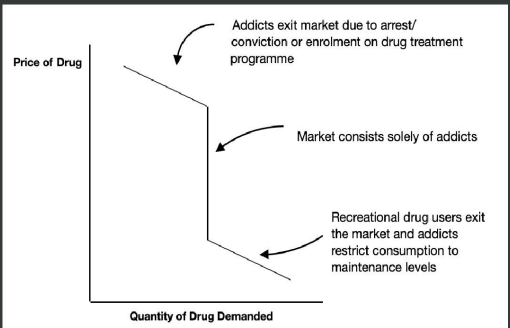


Figure 1: Kinked Demand Curve for Drugs
Source: Wagstaff and Maynard (1988)

Type of Drug	PED
Heroine	-0.94
Cocaine	-0.84
Marijuana	-0.79
Meth/Amphetamine	-1.08
Calculated Mean	-0.9

Figure 2: Price Elasticity of Demand (PED) by Type of Drug (Data from 8 countries, includes recreational use)
Source: Australian Institute of Criminology, No. 606, October 2020

These diagrams are clear, well labelled and easy to read!

However, the Rational Addiction Model proposed by Becker and Murphy disputes this inelastic demand concept. Theorising addiction as time dependency on consumption and the addicted as a rational 'consistent, forward-looking, and individually optimal' agent, the model proposes the concept of 'addictive stock,' which is the knowledge of past intake. The greater the stock, the vaster the current consumption would be. It also assumes that addictive goods cause two effects: tolerance and reinforcement. Tolerance states that more of the good is needed to acquire the same utility as previous consumption. Though this in itself is irrational, as increasing

This paragraph explains the basic concepts of the rational addiction model really well. The trick when having to explain a concept like this is to be concise with your choice of words, don't miss out any important details and use a diagram if you can.

consumption becomes unattainable given the budget constraint, such that utility will diminish. Given tolerance, reinforcement must simultaneously preside, stating that actions are likely to be repeated and that past and current consumption are complements.

We can model the utility function of an addicted individual as $U(t) = U(y(t), c(t), s(t))$, where

t	Time
y	Composite of Non-Addictive Goods
c	Consumption of Addictive Goods
s	Addictive Stock (that depends on past consumption)

In the Rational Addiction model, c(t)=ds(t) represents the steady-state line. When the demand holds this condition at E1, equilibrium is achieved but is unstable as any adverse shocks will increase consumption; while below E1, consumption can reduce. Consumption is assumed to be heavy but not equal to stock between E1 and E2. The no1on that addictive stock must equate to current consumption increases consumption to E2, an equilibria point modelled as a stable equilibrium for an addicted agent. If the price of the addictive good changes, the demand curve is expected to shift. A proposal that price does matter.

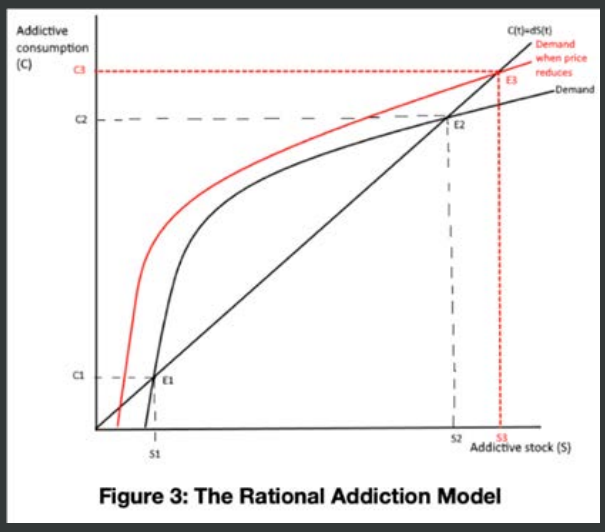


Figure 3: The Rational Addiction Model

Yet the Rational Addiction Model implies that addictive consumers exhibit exponential and time consistent, time discoun1ng. However, Laibson (1997) recognised in them a greater tendency for hyperbolic discounting – choosing 'smaller-sooner' over 'larger-later'

This has also allowed you to generalise the problem away from one or two 'drug types' to a notion of addictive goods more broadly.

Incorporating maths and equations in your essays can really aid the clarity of your point/argument and show the relation-ships between variables- don't be afraid to include them using the 'equation' editor function in MS Word.

rewards, a contradiction of the consumer axiom of monotonicity. He furthers his criticism of the rational addiction framework, modelling individuals as neither forward-looking nor time consistent. This imperfect rationality arises from the fact that individuals are simultaneously 'farsighted planners and myopic doers' (Thaler and Sherin (1981)), but their impulsive urges overwhelm reflection when addicted to a product— inducing demand for the good to be independent of its price.

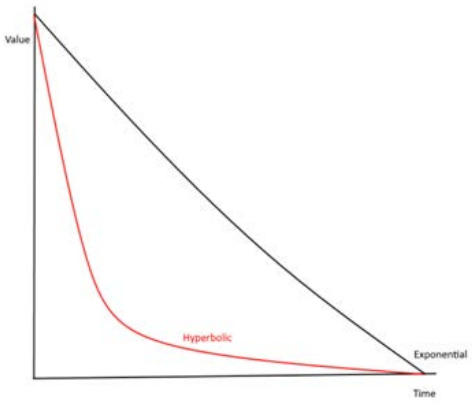


Figure 4: Hyperbolic Discounting Model

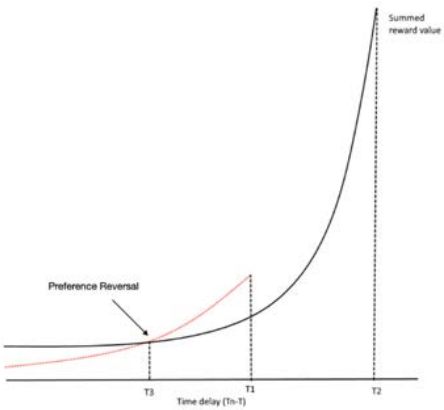


Figure 5: Preference Reversal Due to Myopia

Neo-classical economic theory assumes individuals are always utility -maximising; to be anything else would be irrational. The rational addiction framework models addiction consistent with this belief as addictive consumption forms "part of a consistent, maximising plan." (Vale,2010). However, it is the assumption of stable preferences that question this concept of rational choice. An addict's continuation to increase their addictive stock, and therefore their level of future consumption, while being aware that it is contrary to their better judgment, defines addiction as being akratic under Mele's definition of the term. However, modelling addiction as akratic questions how stable addicts' preferences are. Consumer theory suggests that individuals have exact preferences, yet the apparent 'change of mind' brought about by akrasia indicates that these preferences are not as clear to the addict as consumer theory likes to suggest, and instead, they are unstable. Not only does the uncertainty of an individual's preferences challenge the rational

Criticism, even if it goes against your main point, is absolutely essential to scoring high marks. You will score more highly for exploring whether a theory is correct properly than trying to prove that it is. You can tailor your argument to fit the exploration if needed.

Always good to compare more abstract theories to neoclassical theory if relevant.

Given the students were asked to try and give an overview across two modules, this is a really well considered way to now bring in some of the elements specific to introductory microeconomics they had covered at this point while still within the overall framework of the Society topic.

addiction model, but it also questions the axiom of completeness within consumer theory. All this leads to doubt over whether addictive consumption conforms to rationality, or whether it is more suited to the behavioural economic view of bounded rationality. As addictive consumption represents only adequate utility maximisation, it is a form of satisficing behaviour.

Criticisms of the 'rational addiction' concept derive from Becker and Murphy's assumption of time consistent preferences. Both through a Neuro-economic and economic psychology approach, we have explored that in a market of addicts, by assuming the time consistency of preferences, we are giving rise to the argument that addicts are not utility-maximising agents. The prohibition of drugs demonstrates this irrationality. While prohibition in effect will reduce the supply of addictive goods by presenting more penalties, conforming to deterrence theory - which the forward-looking individual would regard; deterrence has a restrained effect upon addictive consumption. Drugs' glamorisation to a market of addicts leads addictive consumption to be unaffected by such policies, despite the social normalisation to follow such. The ineffectiveness of policies such as 'sin taxes' contextualises that price is not a factor in addicts demand, reinforcing addiction's irrationality. The broader cost not just to the individual of addictive consumption, quantified through 4,393 people dying in 2019 in England and Wales from drug poisoning (John and Butt, 2020), furthers the argument that addiction does not conform to rational choice - it is irrational.

This is a great explicit answer of the research objective stated in the introduction.

The writers have then gone on to summarise points already mentioned in the essay to explain why.

The punchy final sentence is a good way to drive home something to leave a lasting impression for the reader as well as capturing your overall line of discussion.

It may feel like you're repeating yourself to explicitly answer the question in the final sentence, but this is a really good way of adding clarity and contingency to your essay.

The entire essay is written concisely, there is no waffle or attempt to use unnecessary elaborate language. It's not so much about how you say it, it's about what you say.

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The majority of references are from journal articles- this is what the marker is looking for as its difficult for them to mark down your literary review skills.

Consistent and accurate referencing done throughout the essay

STAFF SPOTLIGHT:

BOON HAN KOH

BOON HAN KOH

ABOUT

Specialisation:
Behavioural and Experimental Economics

Research Focus:
Beliefs, discrimination, and gender.

Years at UEA:
Just under two years.

Education:
I completed my undergraduate (B Commerce) and PhD at the University of Melbourne.

Hobbies:
Tabletop games, cooking, and baking!



INTERVIEW

What was your motivation behind specialising in behavioural and experimental economics?

On the one hand, I have always been passionate about adopting a scientific approach to investigation, and this has always been a strength of mine. On the other hand, I am fascinated by the study of human behaviour and how people make choices, especially given various constraints that individuals face, and this was what led me to pursue an economics degree. My interest in behavioural and experimental economics further developed when I took an elective in experimental economics at university. That was when I realised that there was a way to marry these two aspects of my strengths and interests.

BOON HAN KOH

Do you have any working papers that are currently out? Or what's your main research at this point in your career?

My research within behavioural and experimental economics can be broadly classified into two main streams. The first one is about the biases individuals have when forming and updating their beliefs. The second is on issues relating to discrimination and diversity. Some of my research papers share an overlap between these two streams.

Rewinding back to several years ago, as I started my PhD, I was particularly interested in the broader question of what contributes to the legitimacy of leadership in various economic decision-making environments. I think this is a relatively understudied concept in economics. In practice, the authority possessed by leaders can play a huge role in their ability to make decisions credibly. A big question is what provides people in positions of power with the legitimacy of their authority, and how they are viewed for the decisions they make?

This was the starting point of my research in my PhD. As I went further into my research and reading more on this topic, one of the gaps I uncovered was about understanding how people in positions of power are perceived and evaluated for the outcomes that they deliver. How they are judged for their actions and outcomes can often contribute to the incentives they receive and their ability to hold on to their power (think: re-elections of politicians). I approached this question from the perspective of (biased) beliefs formation, and this research then became my job market paper. Suppose you can only observe the outcomes of these decision makers in positions of power, but you don't know what is driving their outcomes. How do we form beliefs about these decision makers when we see a good or a successful outcome, as opposed to a bad outcome or a failure? In our study, we find that bad outcomes of these decision makers are attributed to their actions and good outcomes are attributed to luck.

As I delved deeper into that aspect of the literature, a more recent and second branch of my research emerged, specifically focusing on how individuals of various minority groups are treated in different economic environments. Given the increasing discussion about the prevalent gender gaps

in leadership and labour market outcomes, it motivated me to examine how the gender of the leader (and other characteristics) can influence how we evaluate the decisions they have made and the outcomes they have delivered. This is a paper which I am currently working on. Here, we ask the question of what determines the kind of discretionary payments we make to leaders or decision makers based on their gender and the outcomes that they have delivered. Do we reward or punish people based on our beliefs about the actions that they have taken, or do we simply care about their outcomes alone? We find what we call a 'gender intention weight gap'. For men, both an evaluator's belief about their actions as well as their outcome matter in determining the kind of payments they receive. But for women, only the outcomes matter and not the evaluator's beliefs. Hence, men can get a higher payment despite a bad outcome, as long as people hold them to high regard. But for women, at least in our experiment, it is necessary to get a good outcome in order to get a high payment, regardless of what beliefs evaluators hold about their actions.

What would you say that you enjoy the most working within economics as a discipline?

Much of my interest is about understanding how people make choices, and how these decisions might contribute to inequality. For example, one of my papers looks at what drives the payments that are made to male versus female decision makers, and another paper examines taste-based discrimination against LGBTQ+ individuals. There, we find that individuals who are being perceived as LGBTQ+ may be treated differently, even if there is a lot of noise and uncertainty about their actual identity.

It is not enough to just understand what is happening, but it also crucial to understand what is driving these behaviour, so that we can find ways to improve on any adverse behaviour or outcomes. What I particularly like about economics in general is the use of both formal theoretical models to think about how people make decisions, and empirical research where economists use data with sophisticated tools to complement the findings from these theoretical models. Findings from both fronts complement each other together to further our understanding of individuals' decision-making processes.

BOON HAN KOH

Why did you choose UEA and what is your favourite thing about UEA since you've been here?

The research environment here is amazing and I have great colleagues, which were two of the things that really struck me when visiting the campus before joining the UEA. The UEA has a productive group of behavioural economists and many of their research interests are aligned with mine.

On top of that is the student-lecturer interaction. The student-lecturer ratio at UEA is an improvement compared to my undergraduate experience at the University of Melbourne, where there are about 2,000 undergraduates in the core introductory modules. So, students' interactions with lecturers are not as personalised as what we have at the UEA. At UEA, the students have the opportunity to truly understand what the lecturer is doing in terms of their research, beyond what they can simply read from their textbooks.

What would you say is your most proud achievement in life?

Getting a PhD was probably my proudest achievement. In fact, getting it one week before my 30th birthday was an incredible milestone for me. Finding an academic job straight out of it, where I can continue to pursue my areas of interest, was a great cherry on the top. The job market is highly competitive, and, in fact, it's getting more and more competitive. So, one of the big achievements for me was being able to get a job in an area that I am passionate about.

What are your plans for the next few years academically?

My career goals are to continue publishing papers and knowing more about the complex factors that drive inequalities. I'm still early in my career and a lot of my research at the moment is still looking at understanding the factors that drive some of the types of disparities or unequal treatment of people from different social categories or subgroups. As I move further along, I hope to be able to test simple solutions or interventions that may mitigate some of these factors that I find.

BOON HAN KOH

Do you have any advice for our students today?

Most importantly, have fun. Take your degree seriously, but at the same time, don't! I mean this in the sense that many of the things you learn from a degree goes beyond what we write in lecture notes and read in textbooks. Don't just fixate on these. It is important to reflect on the soft skills you acquire during this time too. Think about presentation skills, how to approach data analysis, rather than thinking about what the end product is. Think about how to design a good experiment, and focus on how to write a report to articulate your findings or thoughts coherently. I think these lessons go beyond the hard knowledge that you should acquire from a degree. For many of you, this is the last sort of formal education before you enter the workplace, so do think about that!

Finally, do you have any hidden gems in Norwich that you're able to share with us?

This is a very difficult question given the lockdown, and the fact that I only joined UEA two years ago. It may not be necessarily a hidden gem, but we all know that parts of the old city wall are visible and you can walk around the city centre to see bits and pieces of it. There is a really nice place just outside of the city centre along Carrow Hill, which is a very pretty walk along the old city wall.

I enjoy geocaching and I think Norwich does have a few geocaches around so I might take some time over summer to check those out. There is also a very nice gin bar in the city centre, which many people probably already know about. It's upstairs just opposite of the Belgium monk.



BOOK REVIEWS

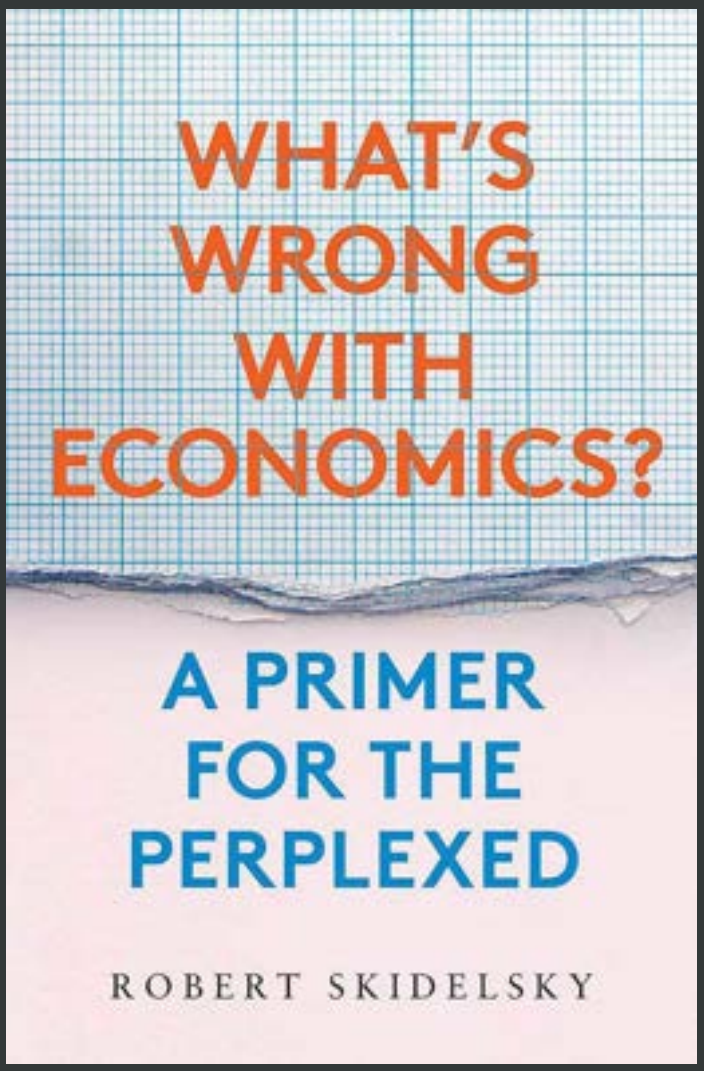
FROM OUR STUDENTS



WHAT'S WRONG WITH ECONOMICS?: A PRIMER FOR THE PERPLEXED

BY ROBERT SKIDELSKY

REVIEWED BY
CLARE PURSER



In the book 'What's wrong with economics? : A primer for the perplexed' Skidelsky aims to answer whether economics is fit for purpose. This is achieved by investigating a vast array of different economic concepts and ideas looking both at the analytical side as well as the more normative aspects of economics. The book critiques the neoclassical approach of economics by focusing on how economists, striving for scientific certainty in their predictions, has led this discipline to become narrowly focused and, in some cases, flawed.

Some of the topics Skidelsky includes are modelling in a closed system, the assumption of rationality (homo economicus), the influence of groups and power on behaviour and the overreliance on mathematics and econometrics to show models and to test hypotheses. The topics covered by Skidelsky can be linked to what is learnt in university studies. The arguments developed help integrate economics with the other social sciences, as well as the humanities subjects.

In each chapter, Skidelsky sets up an argument to challenge the neoclassical theory, with each of the argument's pulling insights from academics of different periods and areas of study. By referring to many academics of different specialisms across time, he provides strong arguments within the text and allows the reader the opportunity to take their research further if they find a certain topic interesting. Readers may already be familiar with some of the academics, but there are

likely to be many academics readers may be unaware of. This, therefore, adds to the wealth of knowledge that can be gained from this book.

The book has also been constructed in a methodical way in order to build-up a logical argument, drawing on the epistemology (how we know these concepts and verify them) and ontology (questioning the fundamentals) of economics. This clear division between the epistemology and ontology of economics (especially at the end of the book) allows for a well-argued conclusion that readers can easily follow and form their own opinions on.

While this book was written for students, to fully understand what this book has to offer, it does require a good grounding of economics jargon and some more complex ideas from economics are drawn upon. Furthermore, an awareness of some of the different schools of thought will make it an easier read. For example, Marxism and institutional economics are often referred to. Moreover, some of the vocabulary used in the book is challenging to comprehend, which can make it a harder read.

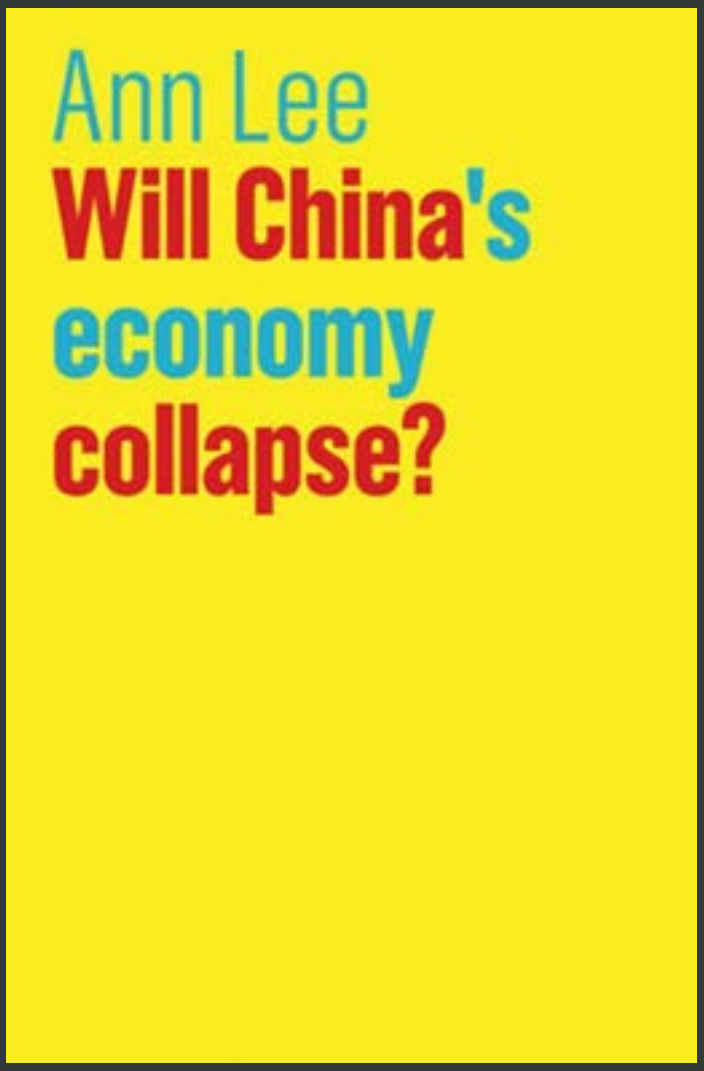
Overall, this book adds a much greater depth of understanding to economics about where and how it can be improved for the future. For those that are interested in pluralist economics and already have a good grounding of economic theory, this is a good book to start with and can be used to then delve into a more specific area of interest in the future.



WILL CHINA'S ECONOMY COLLAPSE?

BY ANN LEE

REVIEWED BY
SHAY NEAL



China has become one of the world's fastest growing economies and has continually achieved double digit economic growth for the last two decades. However, such unprecedented economic growth raises numerous concerns, such as "Is China's economic activity sustainable?" and "How vulnerable are sectors of its economy to potential shocks?". These types of questions are answered by Professor Ann Lee in the book, *Will China's economy collapse?*

Lee is an internationally recognised lead author on China's economic relations. Her book offers a short but comprehensive overview of the structure of China's economy, while analysing its strengths and weaknesses which seek to determine whether there is justified cause for concern.

The core argument made by Professor Lee is that while there are many social and economic issues facing China, its economy is in relatively good shape to deal with them, without threatening collapse.

The book follows a logical structure and begins with a brief description of how certain sectors of China's economy have evolved into the institutions that they are today. This includes: the transition from State owned enterprises to Local Government Finance Vehicles, the challenges textile firms have faced in light of the government's anti-corruption campaigns and the evolving role of the shadow banking sector.

WILL CHINA'S ECONOMY COLLAPSE?

Lee then begins the evaluation of these sectors by performing a cross country analysis and then comparing the limits and capabilities of China's economy to respond to any potentials shocks. This includes issues such as unsustainable debt, market liberalization, stifling innovation and the potential problems caused by an ageing population. The analysis is done in a concise fashion and, when provided in the historical context of other developed and developing economies, the arguments made are easy to understand and quite convincing.

The book then concludes with a final section that touches on the potential for China's economy to benefit the rest of the world. Lee explains that by studying China's strict monetary policies and regulatory practices, there are plenty of things that developed and developing economies could learn.

The strength of the arguments made within the book are that they are not solely viewed from a traditional economic perspective, but instead takes a pluralist stance by considering not just economic factors but also sociological, geographic and psychological factors that play important roles in preventing an economy from collapsing.

The biggest weakness of the book is that it prioritizes breadth over depth, with only 127 pages of content, the depth of analysis will vary from topic to topic. For example, China's monetary policy and its reform of state-owned enterprises are not as detailed as the analysis of China's financial markets. While this is a weakness of the book, it is by no means fatal. As each topic does prepare the reader to engage in further scholarly research on each of these topics.

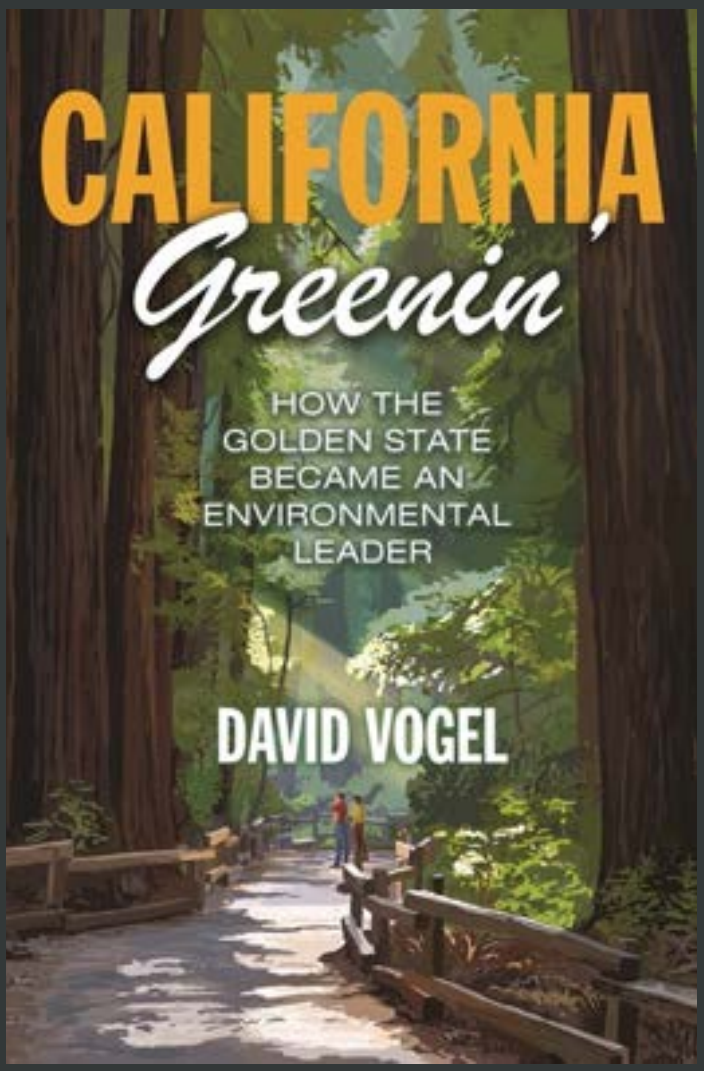
In conclusion, the book provides an insightful and analytical overview of China's economy, exploring economic concepts that even a modest reader of economics will find interesting and useful in developing a greater understanding of the global economy.



CALIFORNIA GREENIN'

BY DAVID VOGEL

REVIEWED BY
MEGAN ROONEY



California Greenin' looks at the political history surrounding the leadership and global recognition of California's environmental policies. I was drawn into this book by its detailed nature of the case study and easy to read chapters.

Although some of the information could be overwhelming, Vogel breaks down the complex details of government policies and makes them really simple – further explained with visual diagrams in some places which adds to the simplicity.

The book focusses on the three key themes that California adopted in its efforts to become a pioneer for sustainability and environmental policies. Those themes are citizen mobilisation, support from local business, and the state capacity. Vogel considers both short- and long -term outcomes of the policies introduced, and shows a clear argument of effectiveness of California's policy makers. This long-term outlook lends itself to a reader exploring more global policies and the effect they could have in tackling climate change and global warming. I think this is one of the most enjoyable aspect of the book, especially in terms of academic reading. It allows us to look at how effective policy implementations can be in a case study setting and what we can learn from California's policies. This, in turn, is done with an optimistic lens to focus on what works and how we can all improve in our fight against environmental damage.

CALIFORNIA GREENIN'

The biggest drawback of the book is that it is quite clinical in the way it is set out - I think it would have been more enjoyable to read had Vogel implemented a personal touch. The book could have included interviews with policy makers or comments from world leaders about California's success but instead it focussed more on policies themselves. It would have also been nice to read different opinions, and perhaps some oppositions to the policies to see where resistance lies.

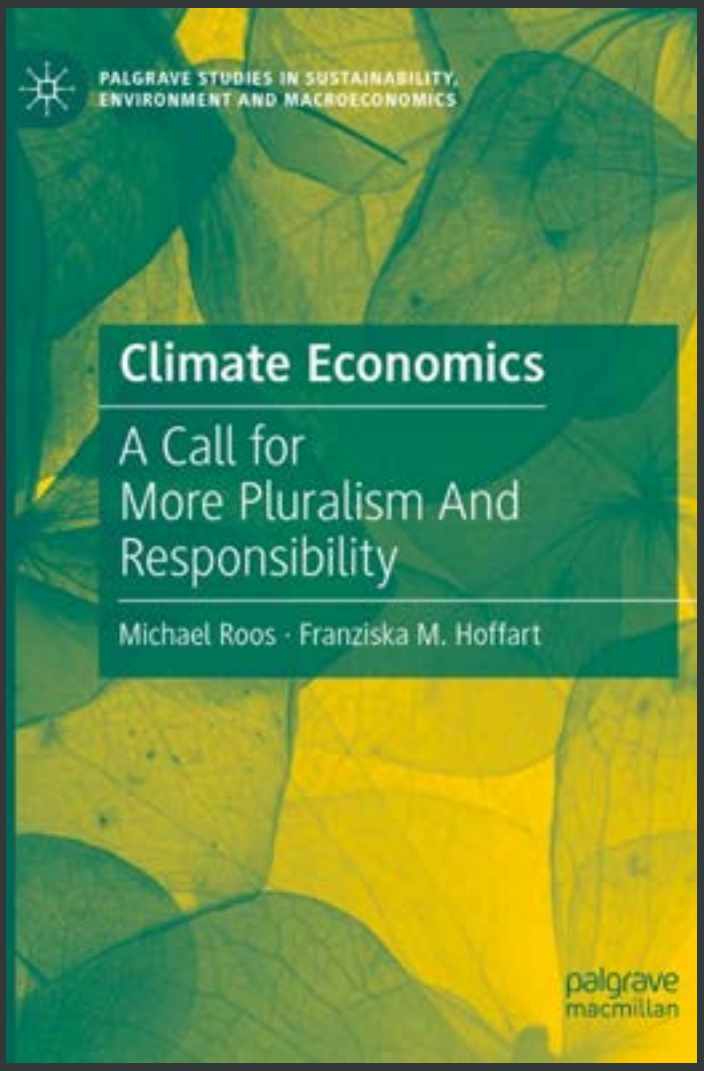
Overall, I think California Greenin was a great book and I learned a lot. Vogel has made some complex processes accessible to the lay-person and, with an optimistic view, it is exciting to see what progress world leaders can now implement to ensure California's success is seen elsewhere.



CLIMATE ECONOMICS – A CALL FOR MORE PLURALISM AND RESPONSIBILITY

BY MICHAEL ROOS AND FRANZISKA M. HOFFART

REVIEWED BY
IRAM AKHTER



In this book, Michael Roos and Franziska M. Hoffart raise awareness of economists' social responsibility in the fight against climate change. The authors urge greater pluralism in the field of climate economics. Through excellently organised arguments, they emphasise the urgent need for climate policy formulation and implementation.

The book illustrates Nobel Prize winner William D. Nordhaus' Dynamic Integrated Model of Climate and Economy (DICE) – a neoclassical integrated assessment model that is used as a climate policy tool and propelled further research on the matter. This model presupposes a perfectly competitive market equilibrium and attempts to determine the 'optimal' carbon tax equivalent to the Social Cost of Carbon (SCC) to maximise social welfare and reduce global warming to whatever extent is 'efficient' for the economy. The authors critique this model on ontological, epistemological and methodological grounds. They highlight that the need of the hour is not economic 'efficiency' but is rather the 'effectiveness' of climate policy implementations in transforming society and the economy. Ethical concerns over neoclassicists' pitting the very existence of the planet against economic efficiency have also been raised in the text.

The neoclassicists' claims of objectivity in research is rejected by the book, based on the argument that choosing a market-based

climate policy structure in the first place is a clear sign of subjectivity. By comparing rankings of mainstream and non-mainstream economic journals, the authors also pinpoint the sovereignty of neoclassicists in the economics domain. They assert that journal's rankings should not be considered representative of their importance, as rankings are based solely on the number of citations. It is essential that climate policy recommendations be made from an interested pluralist perspective rather than a monist one, given the complexity and direness of environmental issues.

It is to be noted, however, that the book does not discredit neoclassical economists; it indeed applauds their efforts to solve the climate change dilemma. The book acknowledges the shortcomings in economic analysis till date so that appropriate innovations can be made for the long-term benefit of the planet and its biodiversity.

The book gives a very comprehensive overview of the existing literature on climate economics. It promotes descriptivism in research over and above normativity in order to enhance the applicability of policy recommendations. It also urges expansion of the economic discipline beyond market-based policy suggestions – towards addressing the "super wicked" problem of climate change instead of increasing global output outside planetary boundaries.

Branches of economics such as climate economics, complexity economics, evolutionary economics etc. are better equipped to make policy intervention to transform economic structure in liaison with planet Earth, the book claims. It contends that academia in economics must make efforts to encourage free-thinking instead of restricting itself to the mainstream. A direct quote says, "The world is complex and surprising such that using only one filter to look at it necessarily leads to blind spots."

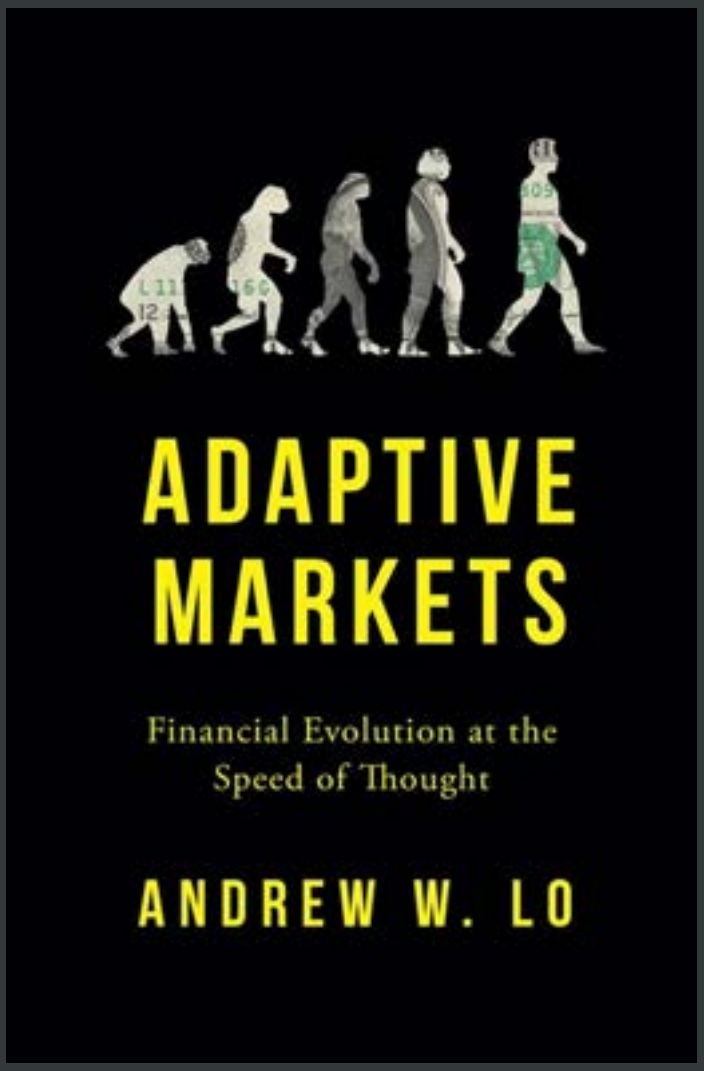
The authors are to be commended for their significant contribution in providing clarity about the current take of economists to the environmental predicament. They have compiled a compelling read that highlights the transformative role of economists in response to the climate dilemma and motivates them to take action.



ADAPTIVE MARKETS, FINANCIAL EVOLUTION AT THE SPEED OF THOUGHT

BY ANDREW W. LO

REVIEWED BY
DIMITRI SCHNEIDER



Andrew W. Lo developed the Adaptive Markets Hypothesis more than a decade ago and presented it in some of his past papers (for instance 2004 and 2011). The book explains his theory for the general audience. The author disputes the validity of the mainstream Efficient Market Hypothesis and sees his theory as an alternative. He describes his theory as follows (p 197):

"Evolution in complex and randomly changing environments can yield surprisingly complex and subtle behaviors ... If we want to understand current behavior, we need to understand the past environments and selective pressures that gave rise to that behavior over time and across generations of trial and error. This idea is the essence of the Adaptive Markets Hypothesis".

The contrast to the Efficient Markets Hypothesis is succinctly given in the abstract of Lo's 2011 paper titled "Adaptive Markets and the New World Order":

"In the Adaptive Markets Hypothesis (AMH) intelligent but fallible investors learn from and adapt to changing economic environments. This implies that markets are not always efficient, but are usually competitive and adaptive, varying in their degree of efficiency as the environment and investor population change over time."

ADAPTIVE MARKETS

Accordingly, the author relies on biology, in particular on Darwin's theory of evolution, and on the behavioral economics to bolster his theory. These topics (as well as some others) are explained in the first five chapters of the book. The author's theory (i.e. the Adaptive Markets Hypothesis) is presented in chapters six to eight. The remaining chapters analyse financial crises from the Adaptive Markets Hypothesis' perspective and provide solutions for the future.

Beside other intriguing findings described in the book, I found the experiments to determine "the stuff good traders are made of" of particular interest. Here's what the author says about it (p 95):

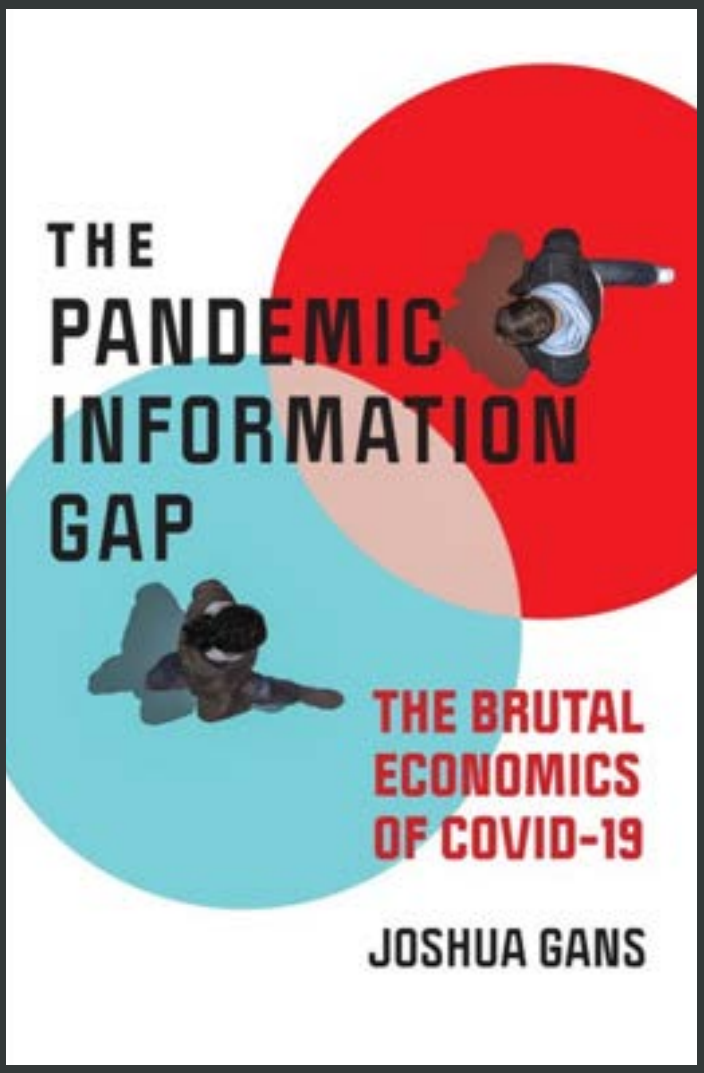
"However, an interesting pattern did emerge once we correlated certain personality traits with their financial returns. Traders who described more intense reactions to both losing and making money performed significantly worse than others. In addition, those who scored higher on a measure of 'internality' – the tendency to ascribe the causes of various events in their lives to their own doing versus random chance – also performed much worse than those who scored lower on this scale."

I found the book to be an entertaining and informative read, with many useful insights. I remain curious, how Andrew W. Lo's theory will develop in the future.

THE PANDEMIC INFORMATION GAP: THE BRUTAL ECONOMICS OF COVID-19

BY JOSHUA GANS

REVIEWED BY
NATACHA LEAVER



This book is a short and looks into the progression of coronavirus and why it all went so wrong. Gans reduces the issues down to the lack of correct scientific facts at critical moments, which resulted in a more prolonged and severe crisis.

He explores the underlying reasons why the UK Covid crisis was so bad and several of the stages where government (in)actions had negative effects on the recovery of both the population and the economy. He does show appreciation, however, that governments did what they could with the information they had at the time.

The book begins by explaining the initial lack of information was so damning because it made it impossible for the government to know how to react to a mostly unknown threat. It then moves on to explain how the inaction of the government after the first cases of coronavirus in the UK, at the end of January 2020, led to both the economy and public health suffering as it spread unchecked for over 6 weeks. The inaction eventually lead to the economy declining further than would have otherwise been necessary in an attempt to preserve the nation's health, Gans argues.

I found these discussions around the macroeconomic trade-offs especially interesting as an economics student. Gans' use of graphs were also useful in furthering my understanding of the subject.

THE PANDEMIC INFORMATION GAP

Gans goes on to argue how false information - especially from governments - led to even more damage in the public's trust in their leaders and in the new data. Next Gans discussed the logic behind intervening to prevent exceeding hospital capacity in the long run (again with clear graphs). He then glanced quickly at some worst case scenarios, before entering the virus testing phase.

The testing phase came across as one of the most important in the book, as it is an essential source of information in a situation with insufficient information. Interestingly, despite having been written before large-scale testing or the discovery that survival of Covid-19 didn't equal immunity, Gans recommended that governments should use testing to move forwards towards eradication of the virus whilst still slowly reopening the economy.

Another section addresses the issue of people's privacy, though I hadn't even considered this a problem previously.

Following this there is some discussion on how invention is the key to ending the pandemic. First through developing a testing regime and then vaccines. Gans details the economics of how this would occur when the costs of R&D may be too high and not covered in the long run, dissuading producers from investing. Again, very interesting to see a clear clash between objectives where social welfare is not in the best interests of companies/economies.

Then Gans moves onto a more relevant chapter on rationing tests and vaccines. This is informative given the current situation with shortages across the world. He outlines methods of distribution which would seemingly optimise both social and economic welfare.

The final chapter is focused on what comes after the pandemic, such as preventative measures that could be put in place based on lessons learnt this time around, with mentions of cost-benefit analysis depending on levels of risk.

Overall, this book is a rather interesting read with clear application of economic concepts in the real world, made relevant by current tragedies. It is written in an easy to understand format and clear explanations of the pandemic from an economist's point of view.

ALUMNI SPOTLIGHT:

JENNIFER MCKEOWN



JENNIFER MCKEOWN

Jennifer McKeown is Head of the Global Economics Service at Capital Economics, one of the leading independent economic research companies in the world. She leads a team of economists focusing on global themes and also oversees regional research to shape the company's view and to draw out the key implications of various forecasts.

Previously, Jennifer was Capital Economics' Chief Europe Economist and prior to that she worked in Monetary Analysis at the Bank of England for several years. She has a BA in Economics from the University of East Anglia and an MSc in Economics from University College London.



Given your time at the Bank for England and now at Capital Economics, what would you say are the key and most frequently used skills you use as an economist?

Analytical skills are clearly the most important in economics. That is, being able to look through a massive amount of data and try to draw out a conclusion or a common theme. Being able to see the wood for the trees and being able to draw conclusions for the real world is very important to any economist. So, maintaining an understanding of current affairs is quite important, which is not so much of a skill but is something that you just really need to practice. You need to pay attention to what is going on in the world around you.

Beyond that, it really depends. There are a lot of different roles within economics. So, for some roles quantitative, modelling and numeracy skills will be very important. Numeracy is important across the board, you need to be comfortable with numbers and comfortable with spreadsheets, but the extent of that varies a lot.

In my role, writing and journalistic skills that are quite important. Increasingly, we are running a lot of webinars and presentation-type skills also are becoming more and more important. But that is not necessarily something that you need to enjoy to be an economist - you could be sat working on a model for your whole career, if that is what interests you.

JENNIFER MCKEOWN

If you were to recommend three of these 'soft skills' to a student who wishes to break into your sector of economics after university, what would they be and why?

That is difficult because it will vary a lot depending on the role and the person. I think things that are very important are having eye for detail and time management, which are important in any job. If these soft skills are something that you can demonstrate, then that is a real bonus. Also, reliability is important, particularly if you are starting your first job because somebody's reliability and consistency can vary quite a lot. So, if you can demonstrate that you are able to stick to goals and pursue things and meet deadlines then that is quite important.

Perhaps the most important thing when you are talking about your soft skills is to be honest with yourself, and to be honest with the person who is looking to employ you. If you try to bend yourself into a job spec, you are not going to be happy and you are not going to achieve your best. If you are a really good leader of people, then by all means stress that and I'm sure there will be employers that find that really valuable. But if you hate it, do not pretend that you love it. There are lots of careers where you do not need to be running a team, where you could be working more on the quantitative side. You can progress that way too.

Students should bear in mind that they don't need to be the perfect candidate for every role. The role needs to be the right role for you as well. You can often feel that you are on the backfoot as somebody looking for a job and you need to seem keen and willing. But it's just as important that the job gives you something and you need to feel that you are in the right place too.

Please can you tell us a little bit more about this career path, and how your roles and studies prepared you for your current position?

I started out at the Bank of England, where I worked in monetary analysis preparing presentations for the pre-monetary policy committee meetings. I was quite lucky in that it is at the heart of the economics of the Bank and I was really in the thick of things. A lot of what I was doing was data, formatting charts, making sure lines were the right colour - that kind of thing at first. But it was very interesting because I got this insight into what the monetary policy committee was doing. Then I moved into European economics at the Bank. I have always had a real interest in European economics and I was lucky to be around when the eurozone began.

For my masters, in all honestly, I was not really actively choosing to do it. I was partially instructed to do it by the Bank of England. It was something I was told I needed to do. I was

very lucky that I got sponsorship from the Bank. I think these kinds of positions are hard to come by, but if you have some interest in doing a masters this is a really good way to do it. Spend a couple of years in the workplace and get a feel for what you like about economics (it's a very big discipline). When you then go and do your masters, you are applying it and you are directing yourself towards what you actually want to do. Doing economics at undergraduate can be a little bit overwhelming, you cover so much across a range of modules. Without some workplace experience, choosing one of those modules to focus on for your masters can be quite difficult and a bit haphazard.

After my masters, I came back to the Bank of England for a couple of years working on the eurozone. Then I went off to Capital Economics where I did the same thing, but it suits me better because it is more commercial. I like working in the private sector and I like thinking about clients and speaking to clients. It feels much more hands on and practical to me. Capital Economics is less academic than what one could be doing at the Bank of England. So, again, even within this spectrum of global macroeconomics, there is quite a range of roles that you could be doing.

I have worked roughly 90% of my career focusing on the on the eurozone, which has obviously been very interesting with the sovereign debt crisis and developments in Greece. But I have more recently moved into global economics because I felt that I wanted to broaden myself a bit. It is really lovely being able to pick up a financial newspaper and knowing that everything in it is of relevance to my job.

It is well documented that economics is a male-dominated profession. What would you say to women and how would you encourage women who are sceptical about joining a profession for these reasons?

I would say please apply – there is absolutely no reason for it to be a male-dominated profession. The issues is getting an awful lot better, look at Christine Lagarde at the helm of the European Central Bank (ECB), Gita Gopinath is chief economist at the International Monetary Fund. There are plenty of role models out there now, which is really great. But we need more applications. We were looking for diversity at Capital economics and I know, cross a broad spectrum of economist employers, it is very difficult to achieve that when your applications are skewed 80% male. For those females who are studying economics, I would say think seriously about whether you want to pursue a role as a professional economist, because there is just absolutely no reason why your sex should create any barriers to doing that. So absolutely please apply.

We are doing some work with local schools trying to interest a wider range of ethnic and

racial backgrounds, including more females, into economics. That is a real issue as well and it needs to start early.

What drew you to macro and global economics as a profession specifically?

I always loved history and if there were many well-paying jobs in every single discipline, I suspect that I would have ended up doing something more directly involved in history. But I am pretty good with numbers, too. So, I guess the combination of those two things, numerical and analytical and historical thinking, drew me to the economics. For most people there are inevitably financial considerations, and I was aware that a role in economics can be relatively financially rewarding. This is probably one of the things that that led me to it.

In moving from European economics to global economics wanted to broaden my remit a little. There are pros and cons of relatively narrow and relatively broad remits. In my current role, for example, it's quite difficult to know anything in a great deal of detail when I need to cover every economy, while it was quite nice working on just the eurozone and being able to really focus in on particular elements, such as the German economy.

The past 12 months have been devastating in many ways but remarkably interesting from an economic perspective. What has it been like as an economist during this period? In particular, how has the economic disruption and uncertainty caused by pandemic impacted economic forecasting?

It has been a really interesting time and a frustrating one in many ways. There were no real precedents for this and what you always do as an economist is to look back to the last crisis and make comparisons and think about what is different this time. It was not easy to look back to the last pandemic, unless you went back to 1918, and then there were so many differences that you cannot really draw all that much from it.

Also, the data that we've traditionally relied on as forecasters suddenly became useless. The timeliest data are six weeks old ordinarily - monthly industrial production figures, retail sales figures are really our bread and butter as economists – and they just suddenly felt like another era. Looking back two months, it just wasn't really any use.

The theoretical structures, such as output gaps, are also pretty important in forecasting, and they've always been very difficult to measure. But the pandemic just threw all that into disarray. We know that demand is absolutely

slumped, but at the same time, there is no there's no supply. So, does that mean that your economy is operating at potential in that given moment? And how do you think about that going forward over the next two years, will supply return at the same time as demand or are reasons why one should return faster than the other?

At Capital economics we do not rely heavily on models. The pandemic has really highlighted to us and confirmed to us of shortcomings of models that are based purely around econometrics and past relationships. We needed to be a bit inventive and look at real world aspects. We were, and we still are, looking at a whole new range of data which are very timely. We have been looking a lot of data on public transport use and economic mobility. For example, Google runs some data on visits to retail sites and workplaces. We never really looked at these before, but suddenly we had to try use these data and apply them to GDP growth and industrial production, and try and work out whether they really are telling us something. It is a new tool for us which we would not have thought to use before, but think we probably always will now to get a really timely picture of what is going on in economies around the world. The pandemic is going to teach economists a lot and it could be a real turning point.

Obviously the pandemic has been horrific, but, as economists, we are lucky to be witnessing this. For students, I would say to take it all in, read a lot, make sure you are really aware of what's going on in the economy and how this pandemic is affecting it. We will be talking about it for many years to come. When you get to the point where you are 20-30 years into your career, and the new comers know nothing about it and were not around during the pandemic, they will be asking you. It is a real benefit professionally to be actually witnessing something like this.

Are there any economic developments that have caused fundamental changes to economics that are a 'must know' for students hoping to become economists?

For students hoping to become an economist, the must know is whatever is in the newspapers. Make sure you are reading from a range of news sources every day. Just because you are not currently in a job it does not mean that you should not be reading a newspaper every day. It is really important to do that.

At Capital economics we are now thinking a lot about policy, both fiscal and monetary policy and how it is going to change going forwards. The pandemic has left us in a situation where debt has risen still further from what was already considered very high levels, and we have a bigger state now and more state influence over a whole range of things. So, we are wondering how much that is going to be pared back, whether there are permanent

implications for the role of the state, whether the state will always be there to bail businesses out during recessions. Also, monetary policy mandates are broadening around central banks. For example, the Federal Reserve is thinking about equality now, the ECB and the Bank of England are starting to consider climate change and the Reserve Bank of New Zealand now needs to target house prices. There is a whole range of mandates beyond simple inflation targeting now, which is going to make for a very interesting future. So that is one of the shifts that is underway that we will be following, and will be of more and more interest over the next few years.

Looking forward, what changes do you think are going to have a big impact on the economics profession?

I think for all financial services this shift to working from home is probably here to stay. It is a major change, and it alters the way that we work a lot. I am finding that I'm giving more presentations to clients than I was previously because it is much easier to do. There is less travel than there was, which is a good and a bad thing. There is going to be an interesting role for economists in working out how these changes are affecting productivity. Does working from home improve your productivity, because you are not travelling or does it doesn't reduce it, because you will be easily distracted? That is a big open question and something that firms will be following quite closely.

A SPECIAL COLLABORATION

THE CORNELL UNDERGRADUATE ECONOMIC REVIEW



A LETTER TO THE NORWICH ECONOMIC PAPERS

BY ANNA MCDOUGALL



Dear Readers of the Norwich Economic Papers,

Greetings from the Cornell Undergraduate Economic Review! It has been about a year since Cornell University first shut down campus due to COVID-19, and though many students have returned to live in Ithaca, New York while taking online or socially distanced courses, the circumstances have made me (and, I think, many of my peers) acutely aware of the increased effort required to stay connected. Therefore, it was with great pleasure that I received a message from the Lead Editor of the Norwich Economic Papers, Daniel Hempstead, suggesting a correspondence between our journals. As Daniel pointed out, collaboration is more important now than ever, so I would like to take the opportunity to share a bit about our journal and the academic situation created by the pandemic in the United States.

The Cornell Undergraduate Economic Review (CUER) is an undergraduate-run journal for undergraduate research produced by students at peer institutions. We publish works on any number of economic topics, with a preference for research that touches on current events and subjects that would be of interest and accessible to an undergraduate audience, including those with a limited background in economics and statistics. Our journal is produced once every semester and is made available online at the Cornell Economics Society website, as well as in hard copy across Cornell campus.

We have been fortunate in that our operations have not been severely curtailed by the pandemic; research produced by undergraduates has been prolific, and we have heard from students from many institutions through the process of gathering entries for our Spring 2021 edition. Beyond

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CUER, I have been pleasantly surprised by how students, faculty, and staff have adapted to the challenges the pandemic poses to student and academic life. Although many aspects of coursework and interacting with other students through clubs and organizations like CUER have become more difficult, a lot of creativity has gone into making it work.

As of April 10, 2021, the Centers for Disease Control and Prevention (CDC) reported that there have been 30,897,028 cases of COVID-19 in the US and 558,028 deaths (CDC, 2021). And beyond its health effects, the pandemic has hit the United States economy pretty hard. According to the Rand Corporation, between February and May 2020, one sixth of United States workers lost their job, because they were laid off, furloughed, on unpaid leave (44% of job losses), could not work because of restrictions put in place to mitigate the virus's spread (32%), were part of a higher risk demographic for complications (11%), had to take care of their children (11%), or were put on paid leave (6%) (Armour et al., 2020). The impacts of the pandemic have hit different sectors of the economy differently; the Bureau of the Labor Statistics reports that industries such as retail trade, social assistance, and wholesale trade have experienced increases in demand for their goods and services, while others, such as scheduled air transportation, accommodation and food services, and mining, quarrying, and oil and gas extraction have experienced huge losses in demand (over 70%) (Bureau of Labor Statistics, 2020).

In the midst of this multifaceted instability, the academic transitioning during the pandemic has left many reasons for optimism. A study produced by the researchers in the Cornell economics department and co-authors at fellow institutions studied seven economics courses at Cornell and other US R1 institutions before and during the pandemic (Orlov et al., 2021)[1]. They found that, although academic performance on a standardised course content assessment suffered during the pandemic compared to pre-pandemic semesters, this decline was mitigated in courses taught by professors with experience in online teaching and courses with significant active learning elements, such as planned peer interaction. This suggests that, with the correct actions, instructors can mitigate the impacts of COVID-19 on learning; even having experience teaching online appears to be helpful, and that is something that most instructors now have. Further, the paper found little evidence that the negative impacts were concentrated among any particular demographic of

student, with the notable exception of first-generation students, who experienced a larger drop in scores during the pandemic semester, significant at the 10% significance level. The pandemic has made societal inequalities glaringly apparent, with the CDC reporting higher coronavirus morbidity and mortality rates among racial and ethnic minorities (CDC, 2020); however, it appears that these disproportionate impacts can be avoided for some groups in certain academic settings.

A review of the pandemic's effects on US institutions of higher education published in *The Chronicle of Higher Education* reports that, at the University of California in Irvine, undergraduate grade averages did not fall, and as in Orlov et al. (2020), higher risk students did not receive concentrated negative effects (McMurtrie, 2021, at ¶4). Researchers led by Professor Richard Arum have found that this seems to be the result of increased studying done by students, a finding that is common to other universities, McMurtrie points out. Other findings mentioned in the article are reflective of the results in Orlov et al. (2020). McMurtrie references a study by Tyton Partners and Every Learner Everywhere that suggested the likelihood of reporting a higher expected failure rate in introductory courses was lower in courses where the instructors felt prepared to teach online. Further, at Irvine, it appears the pandemic has resulted in increases in active learning; the time spent in lecture decreased and the time spent doing interactive work increased as the pandemic went on.

However, this article also points out the significant struggles of students across the United States. As McMurtrie writes, "...averages can hide a lot. Some campuses saw a rise in the number of students on probation or dropping out after a semester, even if average GPAs did not decline. Some campuses reported a significant amount of cheating, which may skew grades and suggest deeper struggles for students" (McMurtrie, 2021). The article goes on to point out evidence from across the country of the hard time first year students had in transitioning into college life, issues with staying motivated, and the greater struggles associated with being a first-generation or low-income student (such as increased likelihood of withdrawals and probation, heightened concerns about tests and the pandemic's effects on their families, and a smaller support network).

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It also clear that the pandemic has taken a toll on students' mental health. Son et al. (2020) studied the effects of the pandemic on the mental health of students at a university in Texas. They found that 71% of their survey respondents reported increases in stress and anxiety because of the pandemic; they reported worrying about their own and their loved ones' health, issues with concentration and sleeping, less socialization, and heightened concerns about academics.

There is no doubt that there have been difficulties that have been embedded in student life during the pandemic in the US, and I am sure in the UK as well. However, in spite all of this, some of the research suggests there is cause for optimism. I am particularly heartened by the warmth with which academic communities have banded together in order to continue researching, teaching, and learning, in spite of and often because of the new challenges the world is facing. I am grateful to the Norwich Economic Papers for this collaboration, and I hope the Cornell Undergraduate Economic Review can remain a part of your community in the future!

Kind regards,

Anna McDougall
Editor-in-Chief
The Cornell Undergraduate Economic Review



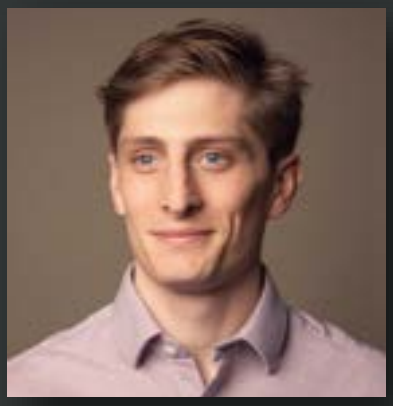
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