

A Green Dawn – 2024

Climate transition is bringing uncertainty, a position where today's governments off predictability is are longer comfortable

John Barry and Paul McCormack

Introduction

As the days lengthen, we have crossed the threshold into Spring. Imbolg the Gaelic traditional festival marks the halfway point between the winter solstice and the spring equinox, the days are lengthening but we are facing many crises. Not only are we facing climate, ecological and energy crises, together with the cost of living one (of what might be termed a 'cost of profiteering' crisis). Many of the key systems upon which our lives and livelihoods depend energy, food, housing, healthcare etc. are also unravelling before our eyes.

However, during all of these crises, we are seeing new light, we believe that 2024 will bring a new Green Dawn, one where energy security will be achieved for Europe through clean energy and simultaneously deliver energy opportunity to developing countries. The new green dawn will bring a transition that will deliver a balance to our world, a just transition for all and act as a catalyst for developing harmony. The transition to net zero empowered by renewables, our Green Dawn will deliver energy democracy if we deliver it equitably. *It's not only about energy, but it's about democracy: when people get empowered about their energy production [...] it empowers them as well as a citizen, as part of a democracy*

Dirk Vansintjan - President at REScoop.eu and EUSEW Digital Ambassador

As the fossil fuel energy skies darken there is light on the horizon– there is a Green Dawn. Clean energy is the catalyst for EU Energy Security and will be the core of the solution that lets us become the masters of our own destiny. Access to clean affordable energy is a fundamental right and one that needs immediate cohesive action from all.

Technological Innovation can be the catalyst for a green dawn but it must be people centred - empathetic innovation where technology works for people, rather than the other way round. We are at the cusp of the 4th Industrial Revolution or Clean Energy Revolution – to be successful it must be driven by people, skills, training and quality of life.

However there are obstacles in the pathway that must be negotiated. In the current rush to secure energy supplies to carry us over the energy crisis there will be many left behind in the transition. Governments in addressing the immediate risks will allow this to mask and obscure the many other challenges society faces. Governments must focus on the long term gain and the many advantages this brings and not the short term.

The Green Dawn brings a once in a lifetime opportunity for government to develop a new clean energy economy and develop parallel strategies for addressing the planetary and cost of living crises

Environmental Opportunity

There is declining public trust in key institutions, including expert knowledge and scientists. For example, the 2020 Edelman Trust Barometer indicated that none of the core institutions - government, business, media and NGOs - are now trusted by the public. Amongst the key reasons for this growing pessimism, the barometer cites record levels of social inequality, growing employee alienation and a growing cynicism around capitalism and the lack of fairness of the economic system. With more than 80% of people believing they are going to lose their job to automation or the gig economy and nearly 60% of people believing capitalism is 'doing more harm than good'.

For a long-time, there's been a tendency for 'the environment' to be presented as an issue only for the educated and well off, something of interest to those who have little else to worry them. In fact, the environment is very much a working-class issue, that is one that affects the majority in society, and it has been a pity and one that.

The climate and energy crises affect all but not in an equal measure. Those in the margins of society are the first to be affected and face the hardest impact. These members of our communities have little or no flexibility in energy choice and are those who carry the greatest burden.

The cost of living crisis, affecting energy, electricity and food, is intertwined with the planetary crisis – the climate and biodiversity crisis, and therefore the 'facts on the ground' of what millions of people are facing all around the world – from the millions in Pakistan forced to move due to the devastating flooding, to the predicted 76% of households in Northern Ireland that will be in fuel poverty come January 2023 – offer a real-world and in real time opportunity to see all of these crises as linked.¹ We can now see how those who worry about the end of

¹ Bradshaw, J. and Keung, A. (2022), *Estimates of Fuel Poverty in January 2023*, available here: <https://jonathanbradshaw.blogspot.com/2022/08/estimates-of-fuel-poverty-in-january.html>

the world as we know it, now have common cause with those who worry about getting to the end of the week. Both stem from the same source.

The cost-of-living crisis is now surpassed by a cost of energy crisis. We as communities have always allowed ourselves to be seduced by the easiest and most convenient solutions. Fossil fuels have always brought this convenience but at an immense cost in environmental, commercial, and social terms.

These are interlocking crises, but they have combined to position the energy crisis at the apex of the volcano.

And for us the root cause of these interlocking crisis is our current globalised, fossil fuelled and growth oriented economic system, capitalism. It has now become both a sub-optimal and increasingly dangerous economic system, to the extent that there is no 'greening business as usual' strategy that will get humanity out of our predicament. In short, there is no capitalist way out of the crisis, and as outlined below, we say this for as *much functional reasons* of ensuring a habitable planet, with rich biodiversity and a stable climate that can provide humanity with the goods and services it needs for people to live dignified and decent lives. While there are many ideological, ethical and normative reasons and arguments that can be given for critiquing and transcending capitalism, and these will also be used in this strategy document, it is important to underscore how, in our judgement, alongside those reasons we now have system-functioning reasons, up to and including giving us the best chance to maintain social order and civilisation as we know it. Yes, things are that serious. We, or rather our political and business leaders, have delayed and blocked action on the climate crisis for example, so that now there is no hope of keeping planetary warming below 1.5°C. Each degree of warming matters: for example, at 2°C of global warming compared to 1.5°C, nearly two billion more people will be exposed to severe heat and food and water stress. We read the reports from the IPCC from 2018 on, but especially those released this year (2022), as giving science-based arguments for radical social and economic change (which we interpret as meaning we need to move beyond capitalism). But it is not only the IPCC that is suggesting this. Significantly, in a leaked memo, reported in the *Guardian* newspaper as the Covid-19 pandemic began to spread rapidly in February 2020, the world's largest financier of the fossil fuel industry, JP Morgan, was revealed to be privately warning its clients that this "business as usual model would have to change if the human race is going to survive".²

² Greenfield, P. and Watts, J. and (2020), 'JP Morgan economists warn climate crisis is threat to human race', *The Guardian*, available at: <https://www.theguardian.com/environment/2020/feb/21/jp-morgan-economists-warn-climate-crisis-threat-human-race>

Climate and Energy Security Crises

For years, many have sought to highlight the growing energy crisis but those in ‘power’ chose to ignore this because of the associated costs and perceived pain of transition. We as society have never evolved from being hunter gatherers, for millennia we have pillaged the world’s natural resources with little or no regard for the consequences. Even now at the climate crisis tipping point the global interest has only come into focus because of the energy crisis. It seems that the only pain that attracts government attention is that of financial pain.

We, and particularly our children and grandchildren, will have to prepare for living in a climate changed world. We also hope this world is also a climate adapted and carbon-constrained one. And we also hope this world is a world of ‘posts’...post-carbon, post-growth, post-consumerism...and above all else post-capitalist. And if some of you reading this are rolling your eyes thinking all those sounds like some lefty, academic, wokist and therefore unrealistic and utopian ‘virtue signalling’, we ask you to consider the following questions. Why is it easier to imagine the end of the world, than the end of capitalism? And why are the dreams of Elon Musk to colonise Mars given serious consideration, while those proposing that we need to move to a different economic system than our current one, are dismissed as naïve?

These examples show that leadership to date has been that of leadership by distraction. Instead of tackling the root causes of society’s ills we look for distraction elsewhere. How can a family on the economic margins struggling to provide the basic be comforted by a Mars dream? Reality is the current checkpoint for all. The energy crisis of the 1970’s in living memory for all resulted in no lasting solutions and we find ourselves in another energy crisis because we have relied on others to provide for us – and at what cost?

We are facing into a perfect storm that of climate challenge and energy crisis. I use the words climate challenge does not change because we must respond to the challenge. We cannot maintain the current energy status quo where the power remains in the hands of the few because that is what has delivered us to this crossroads of humanity. We must redesign the energy equation, remove fossil fuels, place communities at the centre and ensure the energy balance is transferred from the few to the many and deliver clean energy security for all.

As the causes are linked and integrated, so should the solutions and responses, and this is what we set out to do in this strategy document. It is intended less as a ‘blueprint’ for the future, and more as a set of science-based, but politically provocative, guidelines and ideas to inform citizens, policymakers, businesses, the media and especially those in positions of power and influence.

Now, as carbon-fuelled capitalism threatens our home, the earth, as never before, it are those who are the richest who have done the most to cause the problem. This is not a polemical statement against the rich, but rather one based in fact, a fact recently expressed not by wild-

eyed eco socialist revolutionaries or climate activists, but the Intergovernmental Panel on Climate Change. In its report *Climate Change 2022: Mitigation of Climate Change*, it found that:

“The 10% of households with the highest per capita emissions contribute a disproportionately large share of global household GHG emissions... Globally, the 10% of households with the highest per capita emissions contribute 34–45% of global consumption-based household GHG emissions, while the middle 40% contribute 40–53%, and the bottom 50% contribute 13–15%”.³

While an indicator of how unequal the world is (both within and between countries), that 10% of households cause between 40 -50% of GHG emissions is in another sense good news. It means governments only need to target the richest minority in society to realise significant emissions reductions, with the added political benefit of this being what a ‘just transition’ means, with the richest, not the poorest, rightly bearing the costs in terms of changing their lifestyles to reducing their climate impact.

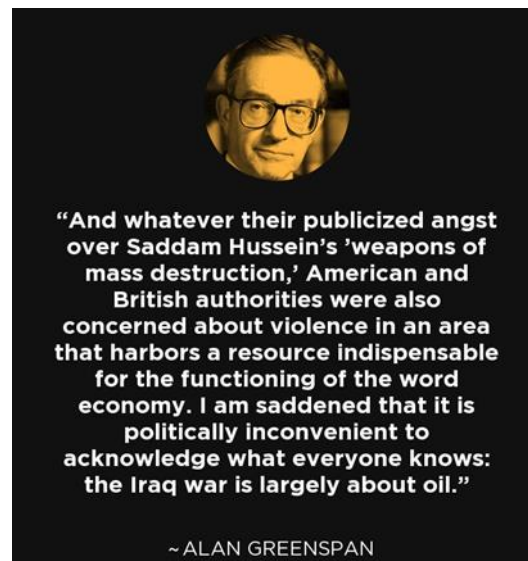
Clean Energy Economy - rebalancing society

We live in a stratified society where those with power – the minority, decide for all. The energy transition to a green destination must be a more equitable journey. One that removes the layers of inequality and use this energy opportunity to create opportunities for all and importantly an open, transparent society.

It is and will be the poorest people who are and will suffer the most from all the crises we face. We need to develop policies to achieve for climate and environmental justice abroad and at home. The vulnerable and marginalised are the most affected by climate change, air and water pollution and energy poverty. Communities that are the least represented or not represented in places of power and positions to influence policies are the most affected by pollution, extraction and other negative ‘externalities’ of the modern globalised and globalising capitalist system. We need a legal framework with environmental rights to protect everyone today and in the future, develop new ways of thinking about and changing the economy beyond economic growth, and to also overcome the tendency not to connect the climate crisis to the cost-of-living crisis or the housing crisis. For example, climate change is connected to our dependence on imported and expensive fossil fuels (the main driver of climate breakdown and geopolitical wars such as the 2003 Iraq war, which even leading members of the pro-capitalist class, such as Alan Greenspan, former Head of the US Federal Reserve has admitted –see below), and how poor housing insulation leads to fuel poverty. The latter made much worse for example in Ireland, because of the overdependence of the

³ IPCC (2022), *Climate Change 2022: Mitigation of Climate Change – Summary for Policymakers*, p.13. Available at: https://www.ipcc.ch/report/ar6/wg3/downloads/report/IPCC_AR6_WGIII_SPM.pdf

region on oil for space heating (a volatile commodity which can quickly escalate in price as we're now seeing due Russian invasion and war in Ukraine), coupled with a very badly insulated housing stock.



For people and the planet, climate change will bring massive and unnecessary destruction and hardship. That's why it's better to call what's happening 'climate breakdown'. As the well-known journalist and activist George Monbiot put it, 'calling it climate change is like calling an invading army unwelcome guest. The severity of the threats posed by climate breakdown cannot be underestimated. As the IPCC put it

"The scale of recent changes across the climate system as a whole – and the present state of many aspects of the climate system – *are unprecedented over many centuries to many thousands of years...* Human-induced climate change is already affecting many weather and climate extremes in every region across the globe."⁴

The reality is that it will be poorest and most vulnerable that are and will suffer the most, especially women, children and people of colour. The core reason for this breakdown is how the world's economy is organised: capitalism is based on the pursuit of endless profit and the belief that economic growth, rather than a temporary and necessary stage of development for a society, must continue forever. But we can't have limitless economic growth on a limited planet, (and the benefits of this growth go to a minority in society in any case), and climate breakdown is one of the outcomes of pursuing it.

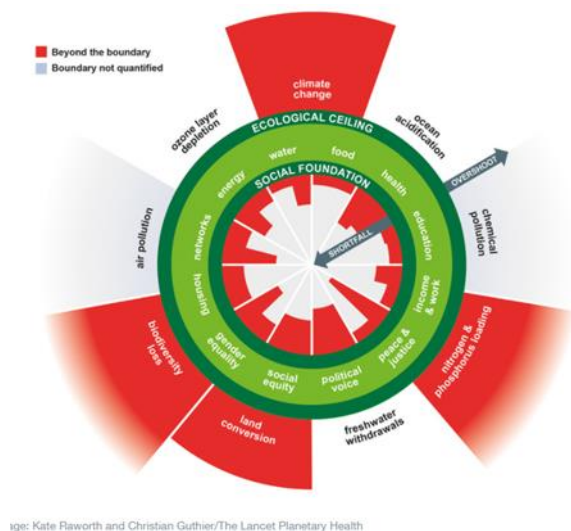
What this means is that we can't stop climate breakdown as long as we have capitalism. To repeat, there is no capitalist way out of the climate crisis. None of us can be sure now exactly what that system should look like, but this document is intended to offer some ideas and is the first steps towards collectively creating a new economy. This new economy can be summed up in terms of moving beyond what activist and author Naomi Klein calls the 'dig and

⁴ IPCC (2021), *Climate Change 2021: The Physical Science Basis*, p.7 available at: https://www.ipcc.ch/report/ar6/wg1/downloads/report/IPCC_AR6_WGI_SPM.pdf

gig economy’ – the unsustainable, ecocidal and extractivist mode of production we have under capitalism, couple with precarious, fixed term and non-unionised employment. From this unjust and unsustainable ‘dig and gig economy’ we need to develop an economic system based on the principles of ‘care and repair’ – making caring for one another and regenerating and healing the earth central to the economy.

We run the risk of measuring climate breakdown in simple financial terms – it will lead to societal breakdown unless it addressed in the correct manner. Shortages in history led to drastic results. One only must look at how food shortages such as those in France in the 1700’s led to revolution. Look at today’s energy and the geopolitics at play. The sands of time are shifting and there are those who are struggling to retain the power they hold. This is not just a crisis in singular terms it has multiple impacts across all our society and communities.

For one of us, this is an eco-socialist economy; based ensuring the economy is within the ‘safe and just space’ of the planetary boundaries and ensuring that no one falls below the ‘social floor’ of making sure everyone’s basic needs for a decent standard of living are met. This idea has been nicely expressed by green economist Kate Raworth in her ‘doughnut economy’ model (see below). This shows that of the nine planetary boundaries, under capitalism we have transgressed 4 of them, while at the same time millions of people within our society and around the world fall below the threshold to meet their basic human needs.



Another principle of this new eco socialist economy, apart from being based on the best available climate and ecological science (unlike capitalism and mainstream economic thinking and existing policymaking), is that what a green, regenerative and just economy requires is the *socialisation of consumption and the democratisation of production*. To break down what these principles mean – socialising consumption means meeting more of our needs from public and shared services, for example, meeting our mobility needs from public

transportation not private car ownership (recognising however, that there will always be a need for cars by some people for some purposes), or using libraries more – not just for books but other things like tools. Democratising production is an old socialist principle that argues ownership and control of the economy should be removed from the ‘anarchy of the market’ and placed under the democratic and political control of the people. After all, the economy should serve the people, not the other way around as it does under capitalism.

Be the rule not the exception

There are two elements of bringing the economy under democratic decision-making. The first is that large parts of the economy (such as education, energy, food, health, housing etc.) should be under state management and control and ‘decommodified’ as much as possible, i.e., be viewed as human rights that every citizen has a right to regardless of income or status. That is, these key goods and services should be available to all citizens and not be commodities to be bought and sold on the market, meaning that those who do not have the income cannot buy them and therefore not have their needs met. Another advantage of state management of parts of the economy is that this enables more efficiency planning of the economy, and planning will be vital to respond to the planetary crisis and avoid waste and ensure we are using all of our resources (land, labour, capital, innovation etc.) effectively. The second begins from the simply question: ‘why should democracy end at the factory gate or office door’? We live in a democracy so why should not the principles of democratic decision-making not extend into the workplace? The sad reality is that for most of us in employment, our workplaces are effectively places where we, as workers, have little if no control over or input into decision-making. Owners, shareholders, and managers have power, workers do not. So, to rectify this we need to bring workplaces under worker control.

Energy powered democracy – a new direction for all

We are at one of the most pivotal times in the Energy industry, facing climate and security challenges. The urgency is driving industry, communities, and society through an accelerated energy transition.

The drive to reduce our carbon footprint energy security has powered companies to unprecedented levels of innovation, transformation, productivity, and efficiency.

REPowerEU is the European wide strategy seeking greener alternative energy sources to power European industry and society. To populate this strategy, we must accelerate the hydrogen revolution, and make clean energy an everyday commodity. Commodification is the transformation of things such as goods, services, ideas, nature, personal information, people, or animals into objects of trade or commodities, that are everyday items. For our energy journey to be widely accepted and deployed we must replace fossil fuels with a commodity that brings a seamless change.

Europe faces multiple pressures to decarbonise economies and to address the urgent need to achieve EU energy independence by accelerating the integration of greater renewable energy sources into our energy systems. Enabling increasing integration of greater renewable energy sources into the energy mix can be achieved with clean energy as the key tool in the toolbox of decarbonisation and key green energy vector which will result in exponential growth of the green energy market.

We must map out a new social evolution based on justifiable balance

We need to explore

“new requirement mix of macroeconomic, industrial, sectoral and labour policies that create an enabling environment for sustainable enterprises to prosper and create decent work opportunities by mobilizing and directing public and private investment towards environmentally sustainable activities. These new arrangements must be adapted to ensure the participation of all relevant stakeholders at the, national, regional, sectoral and local levels in the building of an appropriate policy framework (ILO Guidelines).”

It is clear that climate change won't stop, and working conditions won't change until we transition beyond our current ecocidal economic model. While many factors are still unknown to the experts on what the society and economy of the future will look like, what we know is that our planet's ecosystems cannot sustain any more exploitation and overuse. The climate crisis requires a long term and large-scale state plan to address the protection of our environmental, achieving a stable climate and sustaining and recuperating the very life supporting systems of the planet. Without the financial and political commitment to a system transformation of our economy, any measures to reduce carbon emissions will only be greenwashing and a 'greening of business as usual'. Every part of society will need to change as the Intergovernmental Panel on Climate Change (IPCC) states. In this way the struggle for moving beyond a capitalist, growth and carbon-addicted economy and society, long advocated by ecosocialists and others, now has science behind their demands. In this context the 'utopians' are not those calling for a working towards a post-capitalist society, but those who dream that technology can enable the continuation of a capitalist 'business as usual' system.

This is a dangerous, but politically powerful position that we need to identify and challenge. The reality is that this belief in tinkering and reforming capitalist not only if the dominant narrative we heard from politicians and corporations, but also in the mainstream media, education, such that most people simply accept it as a form of 'commonsense', leading many people to believe that 'there is no alternative' to capitalism. We of course reject this 'commonsense' and see it for what it is, a dominant ideology or 'master story' that has been told and retold to people for decades, with the explicit purpose of making people believe that capitalism is not only the best system, but the only system possible.

Reskilling and Training

As we face the challenges of meeting the demands of the 4th Industrial revolution – the world is awakening to a new green dawn where clean energy is powering the future.

The world is at the threshold of a new industrial future – a future that will be build and powered by clean energy – it is creating an entire new clean economy and millions of jobs but it also is bring risks that need managed. Countries across the globe must devise cohesive strategies to ensure we enjoy a global clean energy revolution with benefits for all. It is vital that we build a balanced pathway to ensure the transition to net zero leaves no community isolated and no investment stranded.

Today we are seeing the first rays of the rapidly emerging global energy economy. Clean Energy has become a central pillar of economic strategy for many countries and they are formulating strategies to navigate the challenges a and secure resultant benefits.

We need to prepare today for tomorrows in demand careers.

Education and training is recognized as having one of the highest long-term returns on investment of all development goals and supports the overall achievement of every country. Education for sustainable development is critical for NI economy as it enables all to acquire the knowledge, skills, attitudes, and values necessary to shape a sustainable future.

We need to change the education system to be more open and accessible to all. No longer bricks and mortar restricted access to the privileged few. Open-source education using digitalisation and enabling learner choice. Task based learning that provides education and vocational mobility'

Our education system needs to adapt to train the workforce for new sustainable jobs and careers. Our third level institutions need to offer and to invest in research and technology that will provide solutions to tackle climate change, but solutions that have people and justice at their centre.

To witness a true green dawn, we must have a just transition – one that has origins of choice not predetermined by existing rules, concepts and established organisations.

Equitable Transition for All

What we need is a 'Equitable Transition'. This concept of this equitable and just transition comes from the 1970s trade union movement and is concerned with ensuring that any transition away from fossil fuels for example, does not negatively impact on workers and communities that depend on fossil fuels for their living. This shows a real lack of understanding of the both the severity of the crisis facing us and the multiple opportunities,

co-benefits and positive outcomes of a non-capitalist response to the crisis. It also illustrates their acceptance that any solutions must be within, not beyond, the current economic and political system, and so they propose that modest reforms and tweaking capitalism slightly will deliver a just transition. This won't do it and a just transition is another greenwashing term that mask the real problem posed by capitalism. As a first tentative step in the right direction we should support just transition efforts, but be clear that what we seek and what the science is clearly telling us, is that we need much more radical economic transformation. As the climate justice slogan has it we need 'system change not climate change', and there is not capitalist or 'business as usual' way out of the crisis.

Climate change is intrinsically linked to the model economical model that has been imposed on the working class for over two centuries. Capitalism, and especially in its neoliberal form over the past 30 years, has caused enormous damage to our environment, other species and has reproduced not solved inequality and injustice among classes, societies and continents. Soil, air and water pollution is occurring everywhere, and we are now experiencing a sixth mass extinction of life on earth. This is not a new phenomenon. What's changed is that natural resources are now limited because of extreme and unsustainable extraction and that entire populations are being displaced because of the consequences of climate change.

Climate change is shackled to the existing economic models, but climate challenge affords us the opportunity for new engagement to meet challenges on all fronts and deploy new models.

For a new dawn to become real capitalism must be moved along the continuum to more of a socialist base but with opportunity still at the core.

Consumerism supported by the debt-based financial system and widespread use of credit, and money borrowing to household is leaving financial, mental and physical consequences for more and more households in societies where the main actors of neoliberalism are based: Europe, America. Such borrowing has masked the reality that real wages have been declining for decades, but borrowing and easy credit has enabled consumerism to continue. While consumerism – the excessive and unnecessary consumption of goods and services- is a major environmental problem, we are also clear that many people in our society and other parts of the world consume too little. What we need to a rationally organised and planned economy where through redistribution, not endless unsustainable growth, we can meet the needs of all. At the same time, it is important to see the disciplining effects of people getting in to debt, it is a great way of constraining them, limiting their ability for example to engage in political activism and protest. The Global South where the large majority natural resources are extracted and are the first victims of climate change cannot move away from inequality, corruption, and instability. But in both the global North and South we see the connections between climate justice and identifying the problem we face is not that we have a poverty problem, but rather a wealth problem. The push for debt-based consumerism in all part of the world has led to increased environmental strain and disasters, as well as eroding local identities, ways of life and cultures as the 'one size fits all' consumer view of the good life bulldozes all before it.

Current systems are all about control. The systems are tipped in favour of the few and enabling them to exert control over the many.

A New Economic Strategy beyond GDP Economic Growth

If capitalism requires infinite economic growth, can we break the link between growth and greenhouse gas emissions, and therefore have a form of 'green growth' and 'green capitalism'? There are those, not least in political and policy making circles, the academy and the media, who argue that new technologies and the switch away from manufacturing and towards services will let us achieve 'green growth'. The idea is that growth will involve using less and less energy and physical raw materials, and therefore produce less waste and pollution. This is presented as 'decoupling' growth from the negative climate and ecological impacts of production. This decoupling argument has been pushed by mainstream economists and politicians for nearly 50 years. But the truth is that there is neither any sign of this happening, or that it is biophysically possible in any case. In the 30 years since the Rio Earth Summit (1992), when world leaders first agreed that radical action was needed to save the planet, global economic growth has been exactly matched by growth in the use of materials: fossil fuels, metals, plant and animal matter, minerals and so on. In the richer countries, the growth in material use has actually been faster than economic growth. In 2017 scientists estimated that, globally, we were using materials at almost twice the rate that the earth can withstand. There is some evidence that some richer countries have managed to 'decouple' the emissions of greenhouse gases from economic growth: with more use of renewable energy and improved energy efficiency, they have decreased emissions while their economies have grown. This is 'relative decoupling', that is indicates that each unit of growth/output is using less energy, resources and creating less CO₂ and other GHG emissions. But what matters from an ecological point of view is 'absolute decoupling', that is the total amount of energy, resources and pollution from the economy. This is the issue of the overall scale or magnitude of the economy and here the science shows that the scale of these improvements is far below the massive decoupling that is needed to stop climate breakdown. So we should not put our faith that Elon Musk or someone else will invent technologies that will somehow in the future to achieve the scale of decoupling a continually growing economy from negative ecological and climate impacts.

In the new green economy, we look to creating new energy opportunities, supply chains and innovative uses. This sector coupling approach seeks to explore where low carbon energies can meet need in specific applications.

This approach could and should extend to the economy where we build new coupling opportunities that seek to redress the imbalances currently widespread.

A 2019 European Environment Bureau report investigated the empirical evidence supporting the widespread assumption amongst political and economic elites (but also amongst many

people too) that “that decoupling environmental pressures from gross domestic product (GDP) could allow future economic growth without end”. Its findings are both stark and very clear. The report reviewed the scientific support for this widely held ‘decoupling hypothesis’ and found that:

“The conclusion is both overwhelmingly clear and sobering: not only is there no empirical evidence supporting the existence of a decoupling of economic growth from environmental pressures on anywhere near the scale needed to deal with environmental breakdown, but also, and perhaps more importantly, such decoupling appears unlikely to happen in the future”.⁵

A major reason for this is that we need to reduce the scale and overall ecological and climate impact of the economy, which means reduce economic growth and replacing it with other objectives of the economy, such as health, including mental health, meeting basic human needs for housing, food etc. In short, the evidence indicates we, in the already affluent world of the Global North, need to create an economy focused on human wellbeing and quality of life, not one based on growth fuelled by using more energy and resources. If we do not use or need growth to meet our needs, as ecosocialists we propose that redistribution not growth is the way forward to enable us to meet the needs of all without endangering the climate and ecological systems upon which we depend for everything. While growth is needed in the Global South, and we need to recognise the many benefits of growth in lifting people out of poverty and destitution and providing many opportunities and benefits to people, we need to recognise two things. The first is that most of the growth and wealth from that growth observed in capitalist economies does not ‘trickle down’ to the poorest. It is the rich minority in society that reap the gains from growth within a capitalist economy.

A good illustration of this in Ireland is the issue of ‘jobless growth’, where because of the activities of global multinational corporations such as Apple, Google, PayPal etc. Irish Gross Domestic Product (GDP, the main measure or indicator of economic growth) is high, but there are no jobs associated with that growth. The drivers of this growth spurt, according to official sources, were a series of ‘inversions’ whereby companies re-locate their official headquarters to Ireland, where only a minority of their business operations take place, in order to benefit from subjecting their profits to Ireland’s low corporation tax rate. Such growth does not care about jobs or people and as far as supporters of the capitalist status quo are concerned, ‘growth is growth is growth’. The second fact we need to recognise is that while economic growth can be good for a society, not least in lifting people out of poverty, we need to abandon the idea that endless economic growth is a permanent objective rather than a temporary phase in a society’s development and evolution. For this reason, any post-growth position is aimed at the ‘over-developed’ minority world, the USA, EU countries, Japan, Australia, and not in countries like China or Africa.

⁵ Parrique T., Barth J., Briens F., C. Kerschner, Kraus-Polk A., Kuokkanen A. and Spangenberg J.H. (2019), *Decoupling Debunked: Evidence and arguments against green growth as a sole strategy for sustainability* (Brussels: EEB), p.3 <https://eeb.org/wp-content/uploads/2019/07/Decoupling-Debunked.pdf>

As the green dawn rises we need to embrace the green economy with resultant opportunities – quality jobs and valued employment – not the current numbers only paradigm

In nature nothing healthy continually grows – living entities, whether humans or animals or plants or even ecosystems do not grow and increase in size indefinitely. Living entities grow and then reach a stage of mature development or equilibrium, a ‘steady state’ as it were. Indeed, we have a name for when growth passes a threshold when it becomes unhealthy and dangerous: cancer. It is for that reason that we can say that in the minority world of the Global North, continuous economic growth is ‘the cancer stage of capitalism’.⁶

Its basic logic. For a capitalist economy to simply remain stable, governments have to aim for 3% growth per annum - thus doubling the size of their economy every twenty years. The simple truth, however, is this is not sustainable given the ecological, resource and pollution limits of our finite planet. The planet is not growing, how can the human economy continually and exponentially grow within a non-growing larger system? As an early green political economist, Kenneth Boulding wisely noted: “Anyone who believes in indefinite growth in anything physical, on a physically finite planet, is either mad or an economist” ...or a capitalist economist to be precise!

As stated, continuous growth is not sustainable. Regular adjustments, realignments etc are all part of life. However, GDP based system makes no allowance for such reality checks – adjustments are always frowned upon and result in financial mania which heaps even more pressure on those at the lowest tiers in society.

At the same time, we also need to recognise that a lot of the decoupling in the Global North is from the outsourcing of production emissions to the Global South. This means capitalist firms locate the polluting production processes in countries like China or India, so the GHG emissions and pollution are ‘off shored’ to those countries, with often lower environmental, health and worker safety standards (so meaning less costs and more profit for corporations), while the products themselves are sold and consumed in the Global North. Our economies and consumers in the Global North get the benefit (cheap products), while the costs are located in the countries of the Global South.

In addressing the energy security of the developed countries, it also presents an opportunity for developing countries to be the energy opportunity and develop energy harmony that will balance our world.

A final point here on post-growth (or degrowth as some term it) to clear up a common misunderstanding. An economy structured around post-growth objectives does NOT mean that ALL sectors or industries and businesses in the economy contract or do not grow. *Post-growth is a macro-economic objective, not a micro-economic one*, aimed at ensuring the

⁶ Barry, J. (2012), ‘Climate Change, “The Cancer Stage of Capitalism” and the return of limits to growth: Towards a Political Economy of Sustainability’, in Pelleing, M. et al (eds), *Climate Change and the Crisis of Capitalism: Chance to Reclaim, Self, Society and Nature*, (London: Routledge), pp. 129-143.

overall economy is not transgressing key ecological, climate and resource limits or thresholds. This means that a post-growth economy is one that will have some sectors and industries growing and expanding (child or elderly care for example), while others contract and possibly eliminated altogether (coal mining or weapons manufacturing).

In summary, our current fossil-fuel based and globalised capitalist economy requires constant economic growth, and all the evidence suggests that you can't have that without ever-increasing resource use, environmental destruction, and catastrophic climate breakdown. Capitalism is like a bicycle, it either 'goes and grows' or collapses... it has no equilibrium or 'steady state'. And that is why a planned and coordinated economy is needed (at least for key goods and services such as energy, food, housing, healthcare, education, transportation) in the transition from this ecocidal, cancerous system to a green, low carbon and more equal economy that prioritises human needs over profits, and human wellbeing over unequally distributed GDP growth.

Lessons from the pandemic

Have we really learned anything from the pandemic? Any lessons that were learned by the public have been lost on government. They have reverted to all the old habits.

COVID produced a series of knee jerk reactions – there was no plan, it illustrated just how poorly governments were prepared.

The resilience displayed by the public was exemplary but is now forgotten. Real social cohesion was evident globally but has not been captured for future use and the development of a real balanced society.

In responding as they have to Covid-19, governments have obliterated the very basis of a neoliberal 'Fiscal Framework' as they have embraced a suite of aggressive monetary and fiscal measures including: nationalising private health providers; prohibiting the short-selling of stocks; suspending utility bills and mortgages; rewarding healthcare workers with bonus payments; introducing business support schemes; student grants; and paying employee's salaries and committing to a universal basic income to name but a few examples from around Europe alone.

Effectively these rapid state responses have both demonstrated that austerity was a lie, and that states can move quickly and be effective, thus going against the neoliberal orthodoxy. And such responses to the pandemic have, temporarily at least, paused the capitalist economic order. The strategic and moot political issue now in the conjoining of the planetary and cost of profiteering/living crises, whether there is a return to the *status quo ante*, or a permanent transformation of the economy, so that rather than 'bouncing back' (the conventional understanding of resilience) we 'bounce forward' and transform towards a very different type of economy and society.

"At all stages we have been guided by the science" (Boris Johnson), "we need to listen to what the science says" (Arlene Foster), 'It's a war' (Italian medic), 'Horse Racing Ireland: putting

people before profit' (RTE News, 15th March 2020), and this remarkable statement from Irish Taoiseach, Leo Varadkar,

"I know that I am asking people to make enormous sacrifices. We're doing it for each other. Together, we can slow [it] in its tracks and push it back. Acting together, as one nation, we can save many lives. Our economy will suffer. It will bounce back."

Governments taking this stance and actually stating that the economy would bounce back was an admission that governments had no plan and no control – wait until the situation would fix itself approach

The 'it' here and the background reason for the other statements is not addressing the climate and ecological emergency, but the coronavirus crisis of course. Yet unlike the coronavirus, there have been official political declarations of 'climate and ecological emergencies' from parliaments in the EU, UK, Ireland, France and over half of UK councils. But, unlike the determined and swift actions of most governments around the world – from China, to Italy, Ireland, the USA – to the public health threat from Covid-19, there is little evidence of the same governmental determination to take radical and tough decisions on the climate and ecological crisis. It is pertinent to ask why not, given the latter crisis presents an even greater threat to the lives of vulnerable citizens in those 'minority world' countries and others in the global south or the 'majority world'.

Could it be that all these declarations of 'emergencies' are just that? Some 'in tune' public and 'politically correct' rhetoric and associated positive media coverage for politicians forced by mobilisations like Extinction Rebellion and the Youth Strike for Climate to do (or say they will do) more on climate action? Cheap talk about recognising there is an emergency.... But in reality not believing it really is an emergency? Why is it that our political leaders listen to and make decisions informed by the science in the case of coronavirus – closing schools, restricting travel, putting in place financial support for those who 'self-isolate' etc. – but not when it comes to the climate and ecological emergency?

Here we need to start from asking a simple but revealing question: Why do we see politicians acting on medical science and expert advice on how to deal with the coronavirus, including making some very difficult decisions, but not on the climate and ecological crisis? While politicians say they accept the climate science, we have very little evidence of the type of action consistent with what the climate science recommends. The climate science indicates we need to urgently and at scale decarbonise not just our energy system (i.e. move away from a dependence on coal, oil and gas) but decarbonise our economies and ways of life: how we travel; the resource inputs and structure of our food system; how we build and maintain our urban spaces and homes; to our views of the 'good life' and expectations of 'normal'. Responses to the pandemic have led to dramatic and radical changes to the lifestyles of most people in countries most affected. These range from citizens staying at home (whether 'self-isolating' and/or working from home, with some people forced to do so as in Italy and France), a massive drop off in air travel, car journeys, and community self-help with neighbours and organisations helping the most vulnerable (but this needs to be balanced with some 'panic buying' of food, household items and medicines in some countries such as the UK). And when we look at some state responses, we can also observe radical action. Perhaps the most dramatic of which is the Spanish government taking all of Spain's private health providers and

their facilities into public control as it declared a national emergency. Along with Italy, Spanish regulators also implemented a ban on the short selling of stocks in more than 100 companies. Other radical initiatives include the temporary suspension of evictions, mortgage holidays and the UK government committing to pay 80% of the salaries of employees who no longer have any work to do. Even in that most neoliberal of states, the USA, we see federal transfers of cash to hard pressed Americans.

The need for a new green start has never been more evident – however governments never act on evidence because we are inextricably linked to dirty energy – this leads to a dirty economy. We have a real once in a lifetime opportunity to clean our energy use and at the same time clean our economy. The strongest currency in the world the dollar is tied to the price of oil. Change the energy equilibrium and the Americans are scared that their currency will suffer – they more than any have a vested interest in keeping a CO₂ intensive economy. Putin is the same he sees green energy as his enemy. His economy (and oligarchs) is built on gas being sold to Europe. The change in energy ownership is destabilising the old CO₂ world order – energy politics are changing the world. African countries rich with sunlight could now be the power brokers of the future – exporting solar power to Europe. Imagine the new G8 in 2050 based on green energy Morocco, Tunisia, Egypt and more.

However, while there is a flurry of discussion and proposals to link the response to the pandemic to addressing the planetary crisis, there are questions to be considered as to whether we can or should link them, and even if it were possible, can the same ‘crisis/emergency’ response we see in the pandemic be replicated in responding to the planetary and cost of profiteering/living crisis? For example, the reality might be that unlike Covid-19, climate breakdown and ecological devastation, is not impacting the lives of people in the rich minority world, it is not something these populations can see rapidly spreading and killing people around them within their own communities and societies. Climate breakdown is more abstract, distant in space and time, than the pandemic which is a ‘clear and present danger’. The dominant public and political discourse around the pandemic is that it will be defeated and therefore a ‘temporary risk’, the drastic changes to our lives are short-term, and then there will be a ‘return to normality’. In short, there is confidence (warranted perhaps) of ‘solving’ the Covid-19 crisis. However, this is not the same with the planetary emergency which, even if we were to achieve the impressive task of getting greenhouse gas emissions down to stay within a 2-degree warmer world, would also mean us having to adapt to a climate changed world. There is no ‘solution’ to the climate crisis, only adaptive and on-going coping strategies, over a much longer period. The demand for ‘emergency solutions’ could usher in large scale technological solutions such as geo-engineering; proponents regularly view such planetary scale technologies as ‘insurance policies’ (Royal Society, 2009), but they bring with them a ‘moral hazard’ of distracting or downplaying mitigation efforts. The fears and concerns around the virus within populations in the minority world which legitimate (at least for now) the unprecedented changes in our lives, including the restriction of our mobility, and the rapid intervention of the state into the economy cannot be said to be present within the same populations around the climate and ecological emergency. However, this is not to say that this is case for other populations more directly experiencing the ‘real and present dangers’ of climate and ecological breakdown in the global south. While this has

arguably always been the case for those in the global south suffering the impacts of planetary devastation here and now, it is increasingly a 'red line' for those nations within international climate politics, as witnessed at the last climate summits in Madrid in December 2019 and Glasgow in November 2021 which ended in failure due in large part to the unwillingness of the high carbon emitting global north to accept responsibility and obligations around the 'loss and damage' from climate breakdown caused by minority world emissions, in nations in the global south.

However, despite there being no direct 'read across' from the pandemic to the planetary emergency, there are surely lessons and insights and glimpses from responses to the pandemic as to what might work to speed and scale up climate action. Some of the changes to the daily lives of citizens we have witnessed, and actions by some states, could be viewed as 'dry runs' for the types of changes the 2018 IPCC report recommended when it stated that "limiting global warming to 1.5C would *require rapid, far-reaching and unprecedented changes in all aspects of society*" (IPCC, 2018). They can also be seen as suspensions of 'business as usual', temporary and extraordinary measures deemed as necessary state actions (and largely so far accepted as necessary by populations) to meet and overcome the pandemic. If we link the demands for rapid and at scale changes in our energy, food, transportation systems (which includes decarbonising them as well as other changes such as relocalising them where possible) needed for addressing the planetary crisis, with the pressing needs for state action to help hard-pressed households and the most vulnerable in our society this winter, there is a compelling case for state action akin to 'wartime mobilisation'. Not for modest, reformist 'business or policy as usual' responses such as we see in how most governments are addressing these crises.

There is a correlation between how fast governments responded to the pandemic and how sluggish they are in responding to the climate crisis. Large industry is behind both responses – pharmaceutical companies lobbied hard and governments responded with £ millions. In the climate case the fossil fuel companies lobbied hard and gave the government £ millions in revenues

Summary

Energy Geopolitics

As we move to a new green economy the old world of power monopoly is changing and countries/multinationals are in fear of their fossil-based power being diluted by green opportunity and the masses gaining more control in the power equation.

Climate transition is bringing uncertainty, a position where today's government's off predictability is not comfortable.

However, the Green Dawn brings multiple opportunities beyond the obvious. By moving to an economy based on clean, secure energy it affords governments the opportunity to fix the world's energy emergency and rebalance the social economy at the same time. The climate crisis and energy shock of 2022 can if handled properly be the catalyst for better government policy. They can be the genesis of a green revolution which can close the current gap between secure supply of energy and a safe climate for all. Current and previous fossil fuel-based

government policies are now running on empty, they have ran out of fuel and must develop new policies based on the clean economy that will deliver a just transition are needed

Food

The pandemic has exposed the fragility of modern globalised food supply chain, with limited storage, a just-in-time supply model, and dependence on imported food (Lang, 2020). The war in Ukraine has also demonstrated this fragility, as well as revealing, for those with eyes to see, the dependence of modern industrialised farming on carbon energy. Alongside shifting agriculture away from its dependence on carbon energy inputs, investment and innovation is needed to enhance food security, sufficiency and resilience through the selective relocalisation of the food system.

On the island of Ireland, we have a major challenge in relation to the disproportionate contribution farming in both jurisdictions make to overall GHG emissions. In the Republic, farming accounts for 40% of GHG emissions, while it is 27% in NI. This is unusual by European standards and presents challenges and opportunities, not least the urgent need for a 'just transition for farmers. Given how toxic the climate change debate has become across Ireland, with farmers being pitted against climate change policy, this 'farmers versus the climate' narrative needs to be exposed as both politically fabricated and unnecessary, and that farmers will be a large part of the climate solution, and that those solutions can, if designed properly, also help with the cost of food and other issues such as food security.

Decarbonising Energy

Governments need to quicken the transition to low carbon energy systems. Investment in renewable energy sources, along with low carbon energy infrastructure, especially the upgrading of national electricity grid systems away from centralised carbon energy plants will ensure countries can meet decarbonisation targets. This should also include R&D and roll out of battery storage technologies and associated infrastructural investment, and the ending of fossil fuel subsidies.

Green hydrogen on the island of Ireland

While a low carbon energy system will be a key feature of any sustainable economic system in the future, we should focus on that future also being a lower energy system. That is, before we do anything on decarbonising our energy use and system, we should look to reduce our energy use. After all the cheapest and most climate friendly form of energy is the energy, you do not use. This challenges the dominant framing of the energy transition – which basically involves replacing a quantum of replace carbon energy we currently use with the same or a larger quantum of renewable energy. But perhaps we use too much and waste too much energy? Might a sustainable energy system be both a low carbon one and one in which we are using and consuming less energy? So, policies to encourage energy reduction, efficiency

and conservation should be elevated up the ‘energy transition ladder’. One such policy is home insulation which we turn to next.

Home Insulation

A low cost and quick policy win would be to roll out a massive insulation programme for the housing stock, targeting the most vulnerable energy poor households first. This would pay for itself in energy savings, improved health and wellbeing outcomes, provide green employment and reduce carbon emissions. Such a policy in addressing both the energy crisis for households and the climate crisis (and it should be publicly linked in this manner) would help overcome the ‘educated, middle class perception of green/climate issues and as a state led process also overcome the individualised way in which significant aspects of the energy transition is structured by governments. Encouraging people (perhaps with some modest grants) to insulate their own homes will not do, since this is beyond the capacity of most people, a situation made worse now because of the cost of profiteering/living crisis. Such individualised policy pathways are not only exclusionary, meaning it only the well-off that can afford solar panels, an electric car or ground source heat pumps. But they also completely neglect the structural /systemic drivers of the problem these policies are designed to address – such as the corporate ownership and control of vital resources such as energy and food. At the same time as we are seeing people forced to ‘heat or eat’, carbon corporations are posting record profits... is there a connection? A state funded massive insulation scheme would not only keep people safe and warm, but also demonstrate to working class people that climate/green policies are in their interests and provide multiple benefits to them and their families. An insulation scheme would not only mean people being warm in the winter, using less energy, but also keep them cool in the summer – an important additional benefit given the heatwaves we have seen across Ireland, the UK and beyond this year, heatwaves that will be a feature of future summers. And a finale benefit of an insulation strategy would be to increase the legitimacy of and democratic support for climate and ecological policies. It would overcome what we might call the ‘yellow vests’ problem, a reference to how the imposition of a climate tax on diesel led to massive public backlash in France in 2018/19, as this was felt as unjust by ordinary people, since they would be disproportionately negatively impacted. Such ‘eco-austerity’ policies are the epitome of what an ‘unjust transition’ looks like, and regressive policy measures such as carbon taxes are likely to led to popular resistance, not support, for climate and decarbonisation policies.

Finance

In the finance sector institutional investors such as pension funds are looking for safe assets to hold. Investment in low carbon infrastructure through the issue of ‘green bonds’ by governments could finance a green stimulus. They could be issued either directly by central governments, or through national or regional green investment banks. Across many countries we see central banks prepared to buy government bonds, in principle without limit (Bofinger, 2020), echoing former UK Chancellor Rishi Sunak’s statement that the government would do ‘whatever it takes’ to provide the resources to respond to the pandemic. In effect this can be viewed as states implementing ‘Quantitative easing for the people’ and ‘modern monetary theory’ (the main claim of which is that there are no financing restrictions for large countries and cross-national underwriting of debts for smaller countries is possible – as would be

possible within the EU if we saw genuine ‘solidarity’). That is, states can afford to do what they need to do most of the time, especially in national and global economic contexts of extremely low inflation, with a glut of private capital looking for safe investments, coupled with unprecedentedly low interest rates (Alpert, 2020). MMT could be the way to finance any green new deal response and if accompanied by cross-national state cooperation for the orderly, urgent and large-scale divestment from carbon energy across the global financial system, would structurally transform the economies of many nations.

Concluding adjuncts

- We need to create a new energy model based on green fuels,
- Globally we must develop a spectrum of energy use that cascades to all parts of the economy from food, fuel, jobs, heat, health, industry mobility and more.
- Governments must note that finance is the outcome not the driver – turn our current disjointed, broken economic model on its head.
- In the past we needed excuses to drive change this time we have opportunities. Previous industrial revolutions have been driven by energy opportunity. The 4th Industrial Revolution is driven by people, skills, training, and quality of life.
- We are no longer a steam, coal or electricity powered economy – we have a burgeoning economy that is being powered by people, governments need to recognise and capture this. How many more ‘tipping points’ can government choose to ignore?
- We need a society that exists in balance with nature and an economy that sustains this balance and does not exploit it.