

More growth or a healthy, sustainable future?

Research has established the negative effects of growth on the environment, climate and health. To remain healthy and thrive requires effective measures to reduce consumption, increase circular processes in agriculture and industry, phase out toxic/non-degradable substances, and to restore, preserve and build up natural capital. Focusing on healthy people and ecosystems rather than growth can give us the basis for a lasting, secure future.

All of us grow up believing firmly that economic growth brings the good life, jobs and higher wages. But this is only half the truth. When we look at the big picture, the whole planet, another truth emerges.

Recent research ([Planetary Boundaries](#)), as well as old ([Limits to Growth 1972](#), [Arrow 1995](#)), shows that humanity has grown so large that it threatens the planet's climate and life-support system, thus threatening our health and well-being. In short, mankind takes up too much space and uses too many resources. Climate change is just one of the problems. For a quick summary, check out [The Great Acceleration](#) (graphic below), [Scientists' Warning](#), [WWF Living Planet 2016](#), the stunning photos at [Overdevelopment](#), [Overpopulation](#), [Overshoot](#) and the article [Clean energy won't save us](#).

Further, the benefits of growth today go largely to the rich, who hardly need more, while the middle class gets little and the bottom half of humanity remains hungry, unhealthy, uneducated and poor ([Picketty](#)).

Instead of peaceful well-being, we now all suffer from increasing climate change, resource conflicts, migration, stress, pollution and threats to our health brought on by growth. The science is clear: it is time to alter course and move in a direction that gives us a brighter future. Let's take a look at how.



New long term goals: human well-being and the biosphere's survival

Instead of growth, we need to set as our goal more important things: **healthy people and a healthy biosphere** ([Raworth](#)). A huge body of research points the way. Here are a few examples:

Energy: [Anderson](#), [SDSN DDP](#), [Figueres](#), [Hansen](#), [IEA 2015](#), [McKinsey](#), [Pollin](#) and many others outline the path to a fossil free, low energy, electrified economy needed to meet the 2015 Paris climate goal. To do that we need to reduce emissions appr. 10% per year beginning now ([Climate Change and Economic Growth](#), [Rockström](#), [Mission2020](#)). Keys are a tax on **carbon** and other **natural resources** to reduce their use (e.g. cars, trucks and air travel) and removal of subsidies to fossil fuels ([Guardian](#)).

However, [clean energy won't save us](#) by itself. We must reinvent our whole economy and lifestyle.

Medical research shows how climate change, poverty and pollution are the enemies of health ([UN Healthy Environment, Healthy People](#), Lancet: [Health and climate](#), Perera: [EHP 2016](#), Lanphear: [Little Things Matter](#), [EHN](#)). Solutions lie in healthy ecosystems, poverty-free societies and a stable climate.

Three important factors affect our impact on nature's health: **population, consumption and technology** (see the [IPAT equation](#)). Technology here accounts for both resource-efficiency and pollution.

Employment: Historically politicians have stimulated consumption to create jobs. Victor ([Managing Without Growth](#)) studied an alternative: a reduced workweek keeps employment high without producing more goods. A [basic income](#) is another solution ([Bregman](#)). We need these as artificial intelligence and automation replace people. And we will have more leisure time, can expect to live comfortably, enjoy less stress and find greater health. Instead of more goods, we get less pollution, healthy ecosystems and a stable climate.

Circular economy saves resources and pollution by improving resource-efficiency (see von Weizsäcker: [Factor Five](#)). This is no help, however, if gains are eaten up by growth in population and consumption, as they have been historically. Example: auto fuel consumption is lower, but more people drive.

Regenerative agriculture: Recycling nutrients saves resources, increases resilience and produces less waste. Granstedt ([Beras project](#), [Farming for the Future](#)) shows how farmers can use locally recycled nutrients with few external inputs. Günther ([Ruralisation](#)) shows how a gradual decentralization strategy facilitates nutrient recycling and self-sufficient communities. The [UN FAO Save and Grow](#) program keeps small farmers productive on the land with good food security (rather than unemployed and hungry in the cities). See also [agroecology](#), [regenerative agriculture](#) and [permaculture](#).

Biodiversity: In order to preserve biosphere function and stability, we need to reduce our share of used land and allocate half of nature to reserves (biologist E O Wilson, [Half Earth](#)).

Local self-sufficiency provides food, water, energy, job and infrastructure security to insure health and survival during catastrophes and for long term climate change. See [Stockholm Resilience Center](#), [100 Resilient Cities](#), [C40 Cities](#), [Community-Wealth.org](#), [Institute for Local Self-Reliance](#) and [Community-change.org](#). Being prepared pays multiple benefits. ([US Cities SDG Index](#), Dawson: [Extreme Cities](#)).

Reducing our consumption stabilizes the climate and reduces pollution. For example, air travel is a major part of annual emissions for many ([Fact sheet: Air Travel](#)). Subsidies and taxes can influence lifestyles, but trend-setting individuals are the real game-changers ([UNEP 2016: Fostering and Communicating Sustainable Lifestyles](#)). Most of us still live beyond a sustainable level (1-2 tons CO2 per person per year) and can easily reduce our footprint ([Less meat, more biodiversity](#), [Worried about the planet? Avoid that extra kid](#)). Which countries are good models of a sustainable economy? See [A Good Life for All Within Planetary Boundaries](#), [Global Footprint Network](#) and [O'Neill 2015](#).

Greater equality: People worry less, stress less and are healthier in more equal societies ([The Spirit Level](#), [Pickett and Wilkinson](#)). While the modern welfare state has here succeeded well, much remains to be done!

Growing populations create land, water, food, resource and infrastructure stress in virtually all the world's cities ([Overstretched Cities](#), [Crist](#)). In the long run, smaller populations can prevent catastrophe and reduce persistent conflicts, crowding and disease (see Ohlsson: [Livelihood Conflicts](#), Brown: [Full Planet, Empty Plates](#)). Working women are questioning large families (Agonito: [The Last Taboo](#)). Family planning is clearly a first step (Bongaarts: [Nature 2016](#), Engelman: [Solutions 2011](#)).

Fair trade/international equity: The rich nations and their corporations have used trade advantage to create wealth (Hornborg: [Global Magic](#)). The poorer nations are determined to catch up and fulfill the [UN SDG goals](#), which the [UNEP IRP](#) calculates will require 3 times current world resource usage. Planetary ecosystems are already overtaxed, so we the well-off need to reduce our consumption and use our resources to help finance development abroad ([Rees 2017](#), [Rees 2014](#), [Contract and converge](#)).

Markets need government regulation to protect our health and safety and preserve ecosystems ([TEEB](#)). Left unrestricted, global corporations/oligarchs overuse the commons (Korten: [When Corporations Rule](#)).

Summary: Focusing on healthy people and ecosystems rather than GDP growth can give us the basis for a lasting, secure future ([Raworth](#)). Each step along the way improves our prospects for a good life.

See also **Economy:** [Doughnut Economics](#) (Raworth), [Come On! Capitalism](#) (von Weizsäcker, Wijkman), [Age of Sustainable Development](#) (Sachs), [Enough Is Enough](#) (Dietz, O'Neil), [Prosperity without Growth](#) (Jackson), [A Future Beyond Growth](#) (Washington, Twomey), [Beyond Growth](#) (Daly), [Small Is Beautiful](#) (Schumacher), [CASSE](#), [degrowth.org](#) **System:** [Club of Rome](#), [Earth Policy Institute](#), [Potsdam Institute](#), [Ecosystem diagram](#) **Population:** [Ten Billion](#) (Emmott), [Overpopulation](#) (Wikipedia) **Solutions:** [SDSN](#), [World Resources Institute](#), [Univ.Calif. Plan B 4.0](#) (Brown), [Drawdown](#) (Hawken), [Half Earth](#) (Wilson), [High seas reserve](#) (Sumaila), [Green Gold](#) (film, Liu), [Ecology Begins at Home](#).