
Sustainable Development Programme

Creating resilience for sustainable development

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Executive summary

The British Academy's *Sustainable Development Programme* funds world-class research aimed at addressing the UN's 2030 Agenda for Sustainable Development and advancing the UK's Aid Strategy. This brief discusses the ways in which policymaking can help build resilience, which in turn will make development more sustainable. Resilience is often understood in a reactive way, as the ability to survive. But in order to create resilience in the true sense of the word – the ability to withstand shocks – more is needed. This brief puts forward lessons learned by the research projects funded by the 2016 *Sustainable Development Programme* about how to increase resilience to the effects of climate change and the unintended consequences of economic growth. It suggests strategies to strengthen governance, urban and energy planning and establish partnerships between states and other stakeholders, building on local capacity and knowledge. It also advocates a set of approaches to increasing citizens' resilience, through education, training and strengthening capacity to claim rights and participate in policy design.

Introduction

The British Academy's 2016 *Sustainable Development Programme* funds world-class research aimed at addressing the UN's 2030 Agenda for Sustainable Development and advancing the UK's Aid Strategy. The [16 interdisciplinary research projects](#) funded by this programme provide important evidence geared towards informing policies and interventions aimed at improving people's lives in developing countries, by reducing poverty and advancing socio-economic development. The *Sustainable Development Programme*, launched in 2016, has thus far supported research projects in three core areas: *Sustainable Governance*, *Sustainable Growth* and *Sustainable Human Development*.

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Resilience has become a ‘buzz word’ in development; a term often used when discussing how people and countries respond to conflict or natural disasters. The UN’s Sustainable Development Goals (SDGs) also mention resilience, calling for the need to build resilient infrastructure (SDG 9), make cities more resilient (SDG 11), and more generally ‘shift the world onto a sustainable and resilient path’. What does resilience really mean?

Often it seems that resilience is used interchangeably with survival.ⁱ It is frequently said, in conflict or disaster situations, that ‘people are so resilient’, while in reality they have no other option but to merely survive. This is not what the term resilience actually means. According to the Oxford English Dictionary, resilience refers to the capacity to recover quickly from difficulties, toughness, and the ability to ‘spring back in shape’. Although people in conflict or disaster-affected regions are indeed extremely inventive in order to survive, rapid recovery from hardship rarely applies to their situation. Conditions of inequality in many developing and conflict-affected countries generally mean that those suffering the consequences of conflict or natural disaster will often take years to recover.ⁱⁱ Likewise, the world has been very slow to respond to climate change. More action is needed if recovery or harm reduction can ever be a real possibility.

How does the concept of resilience, in terms of recovery and the ability to adapt to difficult situations, apply to different contexts and locations, and how can it be promoted? How can people and countries be helped to make themselves more resilient to real and increasing threats? The projects funded by the British Academy’s 2016 *Sustainable Development Programme* suggest ways of doing this.

Strategies to build resilient countries

Resilience to climate change

One of the major risks affecting the world today is climate change. Melting ice caps and rising sea levels threaten to flood low-lying areas, including small island developing states and high-risk countries such as Bangladesh. Other parts of the world, for example Africa and South America, suffer severe droughts which threaten to cause the death of people and animals, and in the long term are likely to lead to increased conflict over scarce resources. This connection between climate change, human and natural disasters and conflict demonstrates the need for policy-makers to connect humanitarian aid and development programmes. This is especially relevant for those countries that will bear the brunt of the effects of climate change.

Adapting to and preventing climate change is crucial for increasing resilience.

Unfortunately, this connection is still being insufficiently made, according to the [Commission on State Fragility, Growth and Development](#), whose work is partly funded by the British Academy’s 2016 *Sustainable Development Programme*. Humanitarian aid generally only responds to the most urgent needs in emergency situations produced by

natural or humanitarian disasters. It therefore fails to contribute to the longer-term capacity building needed to increase resilience to future shocks. Development aid, in contrast, fails to consider or respond to the unforeseen shocks and hazards that the poorest face. It generally focuses on longer-term goals, but thereby risks neglecting the possibility of urgent crises caused by natural or humanitarian disasters, which in their turn constitute threats or obstacles to development. Policy-makers should, therefore, better integrate these two types of programming, by allowing room for contingency funding to respond to the most urgent needs after a natural or humanitarian disaster, while also making sure that humanitarian aid contributes to longer-term development plans to promote processes of building resilience to future shocks.ⁱⁱⁱ

Adapting to climate change is central to efforts to develop increased resilience. The project **The Governance and Implementation of the SDG 13 on Climate Change** has developed an important tool to understand international approaches to dealing with climate change: the ‘Climate Change Laws of the World Database’.^{iv} Some of these laws are climate focused, while in other cases climate considerations have been incorporated into wider frameworks, such as economic development plans or energy laws. The legislation contained in this database can be divided roughly into that aimed at mitigating climate change, primarily by reducing emissions and developing carbon sinks, and that geared towards adapting to climate change by increasing resilience. Some laws combine both approaches in a more comprehensive effort. Unfortunately, the least developed countries lag behind in terms of climate laws, accounting for only 23% of the legislation in the database with just over five laws per country, fewer than the global average of over seven laws per country.

To increase resilience to climate change, the implementation of climate change laws should be enhanced. But this cannot replace the need to look for alternatives to fossil fuels.

A global gap is identified in legislative activity on adaptation – with only 7% of climate-related laws and a further 20% of executive policies globally addressing adaptation, and the rest addressing mitigation. Adaptation in itself is not sufficient to become resilient, if the damaging environmental practices that contribute to climate change are not transformed. An important step is reducing dependence on fossil fuels. Climate laws should, therefore, be connected to wider development policies and energy planning. The G20, responsible for a huge share of fossil fuel emissions, should step up efforts to combat climate change. Although the G20 already has an impressive legislative framework in place to combat climate change, effective implementation is still often lacking, especially at the national level. This calls for the improvement of institutional arrangements to implement existing climate laws. These arrangements should entail a clear delineation of responsibilities among different local and national state institutions and other stakeholders, and include strong processes of monitoring, reporting and verification.^v

Resilience and energy access

To reduce dependence on fossil fuels, the use of renewable energy should be promoted. Access to affordable, renewable energy could improve the lives of many people in developing countries. It could also increase access to the internet, which could promote economic growth by opening up new opportunities in the digital economy. The effects of climate change in the form of a severe drought in 2014 and 2015 made the government of Zambia realise the need to diversify access to renewable energy, which until then had been mainly dominated by hydro-energy. The government decided to initiate ‘Scaling Solar’, a World Bank programme that aims to develop and implement privately funded, grid-connected solar PV projects, delivering electricity at competitive tariffs.

Yet, as the project **Making Light Work** has illustrated, although large public-private partnership (PPP) projects can complement state capacity and thus have the potential to build state resilience to climate change, implementing such partnerships is challenging, especially in the context of developing countries. In Zambia, as in many other African countries, the generation, distribution and transmission of energy have traditionally been controlled by state-owned enterprises (SOEs). Moreover, the various governmental departments and SOEs involved in the implementation of large-scale energy projects often have different motivations and interests. The **Making Light Work** project has illustrated that the change of generation models and the introduction of additional sources of renewable energy can encounter resistance by those relying on long-held norms and practices. Involving private actors also means that aligning the interests of the private sector with those of the government can be a challenge.

If the mandates of development finance institutions become more broad and flexible, they can play a larger role in promoting renewable energy through private sector investment.

The research team found that innovative development finance institutions (DFIs) have a critical role to play in creating 'bankable projects' that can de-risk infrastructure undertakings for private sector involvement. They should, however, be careful not to 'crowd out' commercial finance. The [Commission on State Fragility, Growth and Development](#), part of another project supported by the British Academy's 2016 *Sustainable Development Programme*, has also emphasised the significant role of DFIs. In order to increase their effectiveness, DFIs need to become more flexible and their mandates need to broaden to

allow them to make riskier investments that can work within longer timelines. This requires a change of mind-set. Even where international finance institutions can play an important role in enabling PPPs, local needs and local small to medium-scale initiatives should be taken into account and supported in order to create and strengthen local capacity for renewable energy in a sustainable way.^{vi} This is often not the case. For example, none of the bidders in the 'Scaling Solar' process was Zambian. Involving local partners can contribute to greater resilience than relying solely on foreign investors, who often have fewer vested interests in increasing sustainable energy access and promoting in-country development.

Urban planning for greater resilience

In many countries, strategies for economic growth and development have caused rapid urbanisation, which, if poorly planned, can have negative consequences for both people and the environment. Infectious diseases, such as Dengue, Zika or Chikungunya, can spread more rapidly in densely populated urban areas. Such areas also often experience problems in terms of guaranteeing citizens' access to basic services such as water, sanitation or energy. The project [Integrating Policies on Land Use Changes and Coastal Zone Management to Deliver Food Security and Environmental Conservation \(Land2Coast\)](#) has demonstrated that the rapid urbanisation produced by the tourism boom in Mexico's coastal area of Quintana Roo has destroyed mangrove forests, coral reefs and seagrass meadows. Poor implementation of environmental legislation and a lack of adequate sewage treatment have also severely affected water quality for the local population, with negative impacts on food security.

Tourism planning must consider the social dimension of sustainability. Concentration on the economic dimension, and over-reliance on one sector, can lead to neglect for the social pillar of sustainable development, which in turn increases vulnerabilities. The lack of integration is exemplified by the failure of the planning system to take into account social needs, such as access to urban green spaces which can help to build social links and a sense of place for those living in, and migrating to, urban environments. The [Land2Coast](#) project found that a lack of public spaces in Quintana Roo has negatively affected social cohesion and community identity, which can in turn have negative consequences for the community's resilience to cope with problems when they arise.

The way in which insufficient urban planning can diminish the resilience of a country or a city has also been evidenced by other projects in the 2016 *Sustainable Development Programme*. The project ['The Last 100 Metres': Safeguarding Potable Water Provisioning to Urban Informal Settlements](#) shows how rapid urbanisation in Dhaka (Bangladesh) has led to the occupation of open spaces for housing, industry and other facilities. This has reduced vegetated 'natural' buffer zones which prevent contamination in slums. Instead, contamination corridors and networks run across the city, posing risks to ground water, especially during the rainy season.

Urban planning is crucial to guaranteeing that citizens benefit from sufficient public and green spaces, and have access to basic services such as energy. This can increase social cohesion and local resilience to economic and other shocks.

Inadequate urban planning is also one of the challenges to providing **Sustainable Energy Access in Mozambique**, as the project of the same title demonstrates. In Maputo, areas where the central hospital, government offices and wealthier neighbourhoods are located are well connected to electricity grids. Areas characterised by higher informality, with more dense and irregular land use occupation and difficult road access, in contrast, have a lower level of electricity infrastructure and other urban services, such as water, sanitation and waste collection. The absence of energy and other services in these areas is the result of bad coordination between the national electricity company and local officials involved in land management. Policies which strengthen capacities for

urban planning, and can overcome the ad hoc development which is common in many developing countries, can therefore play an important role in making cities and citizens more resilient. Improved urban planning can help to guarantee that citizens have access to basic services and public (green) spaces, and prevent the unintended consequences of economic growth and urbanisation.

Partnerships to increase resilience

Effective governance and state capacity are crucial factors for increasing resilience. Strategies for improving governance identified by the **Land2Coast** project under the British Academy's 2016 *Sustainable Development Programme* go beyond a purely state-focused approach. The research suggests that those working in both fishing and marine tourism are an important source of local knowledge and capacity. The same is true for civil society organisations, some of which hold repositories of environmental data that could support planning. Working together with a diverse group of stakeholders, including local communities, to co-produce locally specific solutions and to co-manage resources could be an important step to increasing governance capacity. Policy-makers should, therefore, promote arrangements for multi-stakeholder collaboration among public, private sector and community actors. This is important for making countries better equipped to respond to, and prevent, the adverse environmental effects of development strategies such as tourism, and for making growth more sustainable and resilient.

Partnerships with civil society organisations and local communities can increase resilience by complementing government capacities.

The Last 100 Metres project has also highlighted the importance of NGOs. In Bangladesh, NGOs frequently mediate between grassroots groups and the government, for example through pushing for innovative public-private partnerships in which mediating NGOs and mobilised communities install community-based water infrastructure and feeder connections to official water supply lines. These are strategies that policy-makers could replicate in other countries.

The project **Analysing Maritime Security: Capacity Building in the Western Indian Ocean (SafeSeas)** looks at capacity-building assistance in the maritime security sector. Such capacity-building efforts generally involve collaboration and partnerships between various governmental agencies and non-state actors in a transnational setting because of the nature of the maritime arena. The project's Best Practice Toolkit suggests that in order to genuinely contribute to greater resilience of local maritime security actors, capacity-building should be centred on the

ideas and demands of receiving countries, giving them a central role in the coordination. This requires reflexive practitioners, who are open to challenging their own assumptions and learning lessons from experience to avoid repeating mistakes made in the past. They should undertake careful, participative analyses of the environment and political context in which they operate, and make real efforts to improve transparency, for example through information-sharing and coordination among the different agencies implementing capacity-building activities. This allows for more equal and horizontal partnerships which respond to the needs identified by receiving countries instead of donor priorities.

Partnerships involving non-state actors such as civil society organisations and the private sector can be important, but preconditions need to be in place for these partnerships to be successful. **Making Light Work** illustrates that without basic conditions of trust, institutional capacity and alignment among stakeholders' interests, public-private partnerships are unlikely to be successful. The **Commission on State Fragility, Growth and Development** furthermore suggests that to attract private sector investment and overcome the fear of investing in fragile contexts, DFIs and businesses in high-risk places can adapt by using simpler business models, which are less capital intensive and involve shorter value chains.^{vii} In this way, partnerships can be promoted as a strategy to increase resilience and promote sustainable development.

Strategies to increase the resilience of people

Development – its absence but also its promotion – has a direct impact on people's lives. Urbanisation, for example, impacts in diverse ways. The **Land2Coast** project has shown that the measures taken to increase food production in rapidly urbanising inland areas of Quintana Roo (Mexico) have the potential to reduce food security in the coastal zone. This is because artificial fertilisers and pesticides leach through the thin soil profile, flow into the sea and damage the marine environment. **The Last 100 Metres** project, on the other hand, shows that in Bangladesh's densely populated slums water infrastructure is quickly damaged because it is used far beyond its capacity. This increases the chance that the water coming out of water dispersing units is contaminated. Inadequate local sanitation practices, such as the use of dirty buckets, unwashed hands and open defecation (especially by children), increase the risk of the consumption of unclean water. This demonstrates how water and sanitation are not just technical issues, but are influenced by local customs and insufficient education. These are issues of utmost importance in contexts of rapid urbanisation.

Another impact of urbanisation is apparent in Turkey. The project **Living Amid the Ruins: Archaeological Sites as Hubs of Sustainable Development for Local Communities in Southwest Turkey** shows that many young people are migrating from rural to urban areas in search for a better life, risking the loss of traditions and cultural heritage. The project has identified ways to promote sustainable development in these areas of declining and ageing populations. It has developed a hiking trail and accompanying guidebook for existing archaeological sites to attract tourists. This, in turn, could increase business opportunities for marketing locally consumed products such as herbal teas or olive oil to tourists. Women could play an important role, if they are specifically trained and supported. This could not only increase resilience among women, but also of their communities, by drawing on the potential and capacities of groups that are not always included in development policies. This could eventually trigger reverse migration. Policy-makers should, therefore, analyse existing assets which could make local communities more resilient to trends of migration and an ageing population.

In addition to women, the informal sector is often not included in development policies. The project **Creative Kampongs: Mobilising Informal Enterprise and Innovation for Economic Development in Indonesia** shows that informal sectors of society are often spaces of innovation. By mapping the forms of entrepreneurship and innovation strategies, as well the aspirations of different sectors, in three Indonesian cities, the project enables a better understanding of the potential of informal enterprises. Development policies can make use of this potential to increase resilience. Being more aware of innovative grassroots strategies is a first step towards cultivating these and promoting their potential contribution towards sustainable and resilient development.

Some groups, such as women or the informal sector, are not always included in development policies. Drawing on their potential and capacities could help increase their communities' resilience to recover from social, economic or environmental shocks.

Another project funded by the 2016 Sustainable Development Programme, **Equitable Resilience in Local Institutions (ERLI)**, showcases how resilience is experienced on an individual and household level. Research participants in Bangladesh have indicated that caste and socio-economic status are a key factor in their level of resilience. Corruption and insufficient information prevent many people from accessing the governments' social security networks, whereas not owning land or assets prevents people from obtaining loans from

government banks, which provide loans at a lower interest rate than NGOs. This also points to the mixed results of microfinance projects, which are often proposed as a strategy to lift people out of poverty. Instead, **ERLI** suggests that microfinance risks trapping beneficiaries in a circle of inter-generational debt.

Another project, **Asset Transfers or Cash Transfers**, found that both asset and cash transfers are very effective in helping people to make the transition from wage employment into self-employment, leading to increased earnings. The project also underlined the need for policy-makers to keep prioritising education and training on livelihood skills as a strategy for making people more resilient to social, environmental or economic changes. Information, training (including on lobby skills) and education efforts can make people more aware of their rights, for example in terms of women's participation and the existing government services that people should have access to.

Creating more active citizens who can claim their rights can help to improve governance by holding authorities to account and increasing their responsiveness to citizens' needs. The project **Building Sustainable Inclusion: From Intersecting Inequalities to Accountable Relationships** has shown the importance of the work of local NGOs in this process.

Policies that promote education, training and citizenship building can make people more resilient to social, economic and environmental challenges.

These NGOs help to create safe spaces where people can come together and build capacities for political engagement. The research suggests that participatory methods such as visual digital stories, community drama, social media campaigns and community radio can help people to communicate their ideas to policy-makers. Policies can better respond to local needs if beneficiaries participate in their design and implementation. In this way, resilience can move from mere survival to giving people the capacity to truly

recover from shocks and adverse situations through solidarity and collective endeavours.

Conclusion

The findings of the research projects supported under the British Academy's 2016 *Sustainable Development Programme* shed light on the diverse ways in which climate change, conflict and the unintended consequences of economic growth can reduce the resilience of people and countries. The projects reveal important lessons for building resilience with a view to promoting sustainable development:

- Resilience is often understood in a reactive way, of coping with changing conditions. It should, however, be understood in a pro-active sense of equipping people and countries to recover from challenges and shocks.
- Although many climate and environmental laws exist to prevent (further) damage, often these laws are not implemented as a result of weak governance. To increase resilience to climate change, policy-makers should not focus on drafting new laws, but on strengthening the implementation and monitoring of existing ones.
- Pro-active planning of development, infrastructure and economic growth is needed to prevent unintended consequences, include all sectors of society and create greater social cohesion, which can ultimately increase resilience.
- Equitable partnerships have significant potential to complement government capacities. Partnerships can be established between public and private actors, between governments and civil society, or using a multi-actor approach. Development finance institutions should take on more flexible and innovative roles. Policies can help to promote these arrangements and delineate clear responsibilities for all actors involved.
- The local knowledge and capacity of citizens is an important factor in promoting resilience. To increase citizens' potential to be actively involved in designing and implementing the policies affecting them, citizenship-building through education and training is crucial, specifically taking into account groups which are often forgotten in development, such as women or people working in the informal sector.

For more information about the 2016 Sustainable Development Programme, visit <https://www.thebritishacademy.ac.uk/programmes/sustainable-development-2016> or email gcrf@thebritishacademy.ac.uk

ⁱ Tasnina Karim (2017), 'Resilience of What and Resilience for Whom?: Part 1'. Available at <https://equitableresilience.wordpress.com/2017/07/07/first-blog-post/>.

ⁱⁱ Matin, N., Forrester, J. and Ensor, J. (2018), 'What is Equitable Resilience?' *World Development* 109: 197-205.

ⁱⁱⁱ Commission on State Fragility, Growth and Development (2018), *Escaping the Fragility Trap*.

^{iv} Grantham Research Institute on Climate Change and the Environment, 'Climate Change Laws of the World'. Available from <http://www.lse.ac.uk/GranthamInstitute/climate-change-laws-of-the-world/>.

^v Nachmany, M., Fankhauser, S., Setzer, J. and Averchenkova, A. (2017), 'Global Trends in Climate Change Legislation and Litigation' and Nachmany, M., Fankhauser, S., Setzer, J. and Averchenkova, A. (2017), 'Policy Brief. Global Trends in Climate Change Legislation and Litigation: 2017 Snapshot'.

^{vi} Money, A., Stritzke, S., Geiger, M., and Ayers, J. (2018), 'Making Light Work'. Policy Briefing March 2018 and International Growth Centre (2017): 'Risky Business: Takeaways from the Fragility Commission's 4th Evidence Session'. Available from: <https://www.theigc.org/blog/risky-business-takeaways-fragility-commissions-evidence-session/>.

^{vii} International Growth Centre (2017): 'Risky Business: Takeaways from the Fragility Commission's 4th Evidence Session'. Available from: <https://www.theigc.org/blog/risky-business-takeaways-fragility-commissions-evidence-session/>.