Tourism, Gender and Resource Efficiency: Mitigating Climate Change

The tourism sector has a dual relationship with climate change, being both victim and contributor. Furthermore, despite efficiency gains and the introduction of new and more efficient technologies, there is clear evidence that tourism’s global resource consumption is growing rapidly. It is estimated that tourism’s global resource use, including energy, water, land and food, will at least double over the coming four decades.

Whilst the links between climate change and gender and between resource efficiency and gender have been explored in research and policy, there have been very limited attempts to understand the complex inter-relationships between tourism, resource management and climate change through a gender lens. This factsheet seeks to fill this gap and provide some recommendations aimed at recognising and promoting the role of women in better resource management thereby contributing to mitigating climate change impacts.

Tourism’s contribution to climate change

Over the last decade or more, tourism’s carbon footprint has been steadily increasing and currently accounts for about 8% of global greenhouse gas (GHG) emissions, up from an estimated 5% in 2005. In the 2018 study, emissions were: 49% from transportation, 12% from retail, 10% from food & beverage services and 6% from accommodations.

Tourism as victim of climate change: Many so-called ‘tourism hotspots’ are also the most vulnerable to climate change. Coastal areas that are close to the ocean as well as mountainous areas and polar regions are especially vulnerable to the impacts of climate change in the form of floods, droughts, heat waves or hurricanes. Rising sea levels, food insecurity, coastal erosion, loss of eco-systems such as coral reefs and disruption to cultural and natural heritage sites are also undermining the long-term sustainability of the tourism industry. As documented by UNEP and others, the effects of tourism decline in highly tourism-dependent destinations, also include losses of jobs, homes, lives, and hope.

The disproportionate effects of climate change on women: It has been widely recognised that, owing to the fact that women constitute the majority of the world’s poor, they are disproportionately affected by the effects of climate change. Women who are poor and marginalized in low-paying jobs, for instance, have fewer resources to cope with drought, flooding and other consequences of climate shifts. Their vulnerability is largely due to structures that marginalise women socially, politically and economically. For example, the impact of devastating droughts in South Africa that occurred in 2019, resulted in exacerbating existing gender inequalities and discrimination faced by women workers in the agricultural sector. While similar research studies have not been carried out in relation to tourism, it is clear that women in this sector are equally vulnerable due to their high concentration in insecure and low paid employment.

Resource efficiency as the key to mitigating climate change: Conserving natural resources is a basic requirement for sustainable development and improving the quality of human life. More efficient use of resources is a key strategy in the mitigation of climate change. A recent UNEP report highlighted a range of material efficiency strategies that could significantly reduce greenhouse gas emissions in the coming decades.
Women are the main users of household energy in developing and industrial countries and tend to have a bigger say in household energy decisions. In developing countries, women have primary responsibility for collecting firewood for cooking and in many cases spend up to 20 hours or more a week carrying heavy loads of firewood from long distances. They need cooking energy that is less labour-intensive and time-consuming and, as such, women worldwide have an important role to play in sustainable energy development. Some indications suggest that women are more likely than men to conserve energy—using up to 22 per cent less, including through a greater willingness to alter everyday behaviours. "Without their involvement, renewable energy projects risk being inappropriate, and failing".

Water supplies, both for tourism and domestic use have been seriously undermined by the increasing incidence of floods and droughts linked to climate change. As providers and managers of water at the household level, it is women who bear the greatest burden from a lack of supply. Research in Indonesia has shown that women are disproportionately affected by water scarcity linked to tourism development. However, as illustrated in a study of the relationship between female entrepreneurs and water management practices in the northern Moroccan tourism industry, female-owned and managed companies can play a key role in effective water management and poverty reduction in tourist destinations. For example, the female owner and manager of one of the small hotels in the study introduced a range of water-saving technologies and practices in the kitchen, the garden and the guest rooms and provided training and regular monitoring of staff in all sectors, resulting in water consumption levels well below the average in the area.

Tourism is a major contributor of waste in many popular tourism destinations. For example, a study in Thailand found tourism contributed a third of solid waste at the tourist destination and a stay led to 1.74 kg per night - double the local waste generation rate per capita and there are concerns that the expansion of tourism activities in the area could result in even more waste being generated. Studies on waste management in India, Indonesia, the Philippines and Vietnam found that women constitute the majority of the informal, unregulated workforce in this sector, whilst men tend to be employed in the dominant formal waste sector. Women face social stigma and economic deprivation, as well as health and safety issues linked to the physical nature of waste management. Despite some examples of good practices in relation to waste management within the tourism sector, a lot more needs to be done in terms of waste recycling and the protection of women workers in the sector.
Policy Recommendations, Frameworks and Guidance

**Linking Climate Change and Gender**

**UNDP Framework for Advancing Gender Equality in National Climate Plans**: While the framework is directed primarily at governments, it establishes the crucial importance of gender equality as the basis for actions aimed at mitigating the impacts of climate change. The framework also underlines the vital importance of gender-disaggregated data and indicators for the measurement of change, thereby moving from pledges to impact.

**United Nations Framework Convention on Climate Change (UNFCC) - Gender Action Plan**: Sets out objectives and activities under five priority areas that aim to advance knowledge and understanding of gender-responsive climate action calls for women’s full, equal and meaningful participation in the process of the United Nations Framework Convention on Climate Change (UNFCC).

**Gender and Resource Management**

**Beijing Platform for Action**: Identifies environmental management as one of the key strategic priorities to be addressed by governments and the private sector and highlights the importance of integrating indigenous women’s knowledge and experience in policies and strategies for the optimisation of resource management in the context of climate change.

**Linking Gender and Energy**: Theoretical framework and action plan.

**Tourism and Human Rights**


Policy Recommendations for Tourism Businesses

- **Consult women, especially indigenous women** in the development of tourism infrastructure project designs aimed at promoting fossil fuel efficiency and the use of renewable energy.

- **Adopt policies** aimed at improving women’s status and employment conditions in relation to their roles in resource and waste management: Through leadership and technical training, performance monitoring and the engagement of women as professionals, managers and decision-makers.

- **Conduct gendered participatory Human Rights Impact Assessments** to identify your company’s differential impact on local communities’ resources, including access to water and energy supplies. This is an extension of environmental and social impact and risk assessments that many companies already routinely undertake. The additional cost for businesses is offset by benefits, such as enhancing reputation, investor confidence, staff retention, production and profitability.

- **Ensure women’s equal representation in decision-making and policy development processes of tourism companies and governmental bodies**: Local women must be directly involved in the development of climate change mitigation strategies and shaping resource use and climate policies in the tourism sector.

- **Ensure adequate budgeting for the implementation of the above policies**: This includes gender budgeting in all climate change-related budgets and/or the establishment of a separate budget to address gender priorities and gender-targeted activities related to climate change.

**Equality in Tourism and Associates COP 26 Declaration on Tourism and Gender Equality** calls on all tourism sectors “to ensure that women’s rights and needs be reflected in their participation in the planning and development of policies mitigating the impacts of climate change and re-orientating tourism”.

Supported by: [Equality in Tourism and Associates](https://www.equalityintourism.org) [Federal Ministry for the Environment, Nature Conservation and Nuclear Safety](https://www.bmu.de) [Transforming Tourism](https://www.transformingtourism.org) [UN Environment Programme](https://www.unenvironment.org)

Based on a decision of the German Bundestag.
Water: Bali, tourism and water case study
In Bali, an Indonesian island, local people’s fundamental human right to water that meets their basic needs is threatened by tourism. On average, tourists’ per capita consumption of water far exceeds that of the local people, thereby disrupting the established traditional system for the sharing of water among rice farmers (subak). First-hand research involving all stakeholders, illustrates the positive impact of a ‘rights-based approach’. This entailed carrying out an impact assessment focussing on the human right to water. It showed that, not only would local people benefit by having their right to water protected, but tourism businesses would also benefit from averting the shared risk posed by water shortages for all stakeholders. The key lesson learnt from this action research is that carrying out human rights assessments is beneficial both to businesses and local residents in tourism destinations.

In the Himalayas, the former Maoist conflict in the 1990s conflict triggered a decline in tourism, which has since been exacerbated by the profound impacts of climate change. This has led to severe water shortages and adverse health outcomes in the region. Over the last 25 years, Adventure Alternative, a responsible travel company, has been working closely with women in the local communities to address these issues. For example, improved stoves were installed in all homes in the Bumburi village in Nepal, which have been able to halve firewood consumption and significantly decrease smoke production. The introduction of these improved stoves has helped to reduce respiratory and eye problems for women and children. This initiative has also contributed to preserving the Himalayan forest habitat and enhancing the water supply. As a result, a small tourism destination has emerged in the Sherpa heartland and many women currently work as trekking guides. Find out more.

Tourism, waste recycling and women’s empowerment: an Indonesian case study
In Labuan Bajo, Indonesia, not only were the tourism and hospitality sectors severely affected during the peak of the pandemic in May 2020, but also general waste and recycling collection were disrupted, forcing households to burn their own waste. With the collective efforts of the Komodo National Park authorities, Komodo village government and the women’s environmental group Wine Raso Kiling, waste from the recycling storage within the national park was transported to Labuan Bajo to be sold and used as a steady source of income for locals and the wives of unemployed tourism workers. Wine Raso Kiling members were able to increase their earnings from US$10 to $125/month from the sale of waste to companies who sold the plastic to be transformed first into ‘chop’ plastic and subsequently into a range of projects, such as textiles, bags, place mats and rope. Women displaced from laundry work were employed to sort the waste before shipping. They worked for 3 hours daily to accommodate their family/home commitments. Not only did the pivot from tourism to waste collection, sorting and recycling provide economic resilience for women previously employed in the tourism sector, but it also had environment benefits, including a healthier coral reef, increased fish stocks, as well as providing important health and well-being benefits for the wider community. Read more.