Recipes for Resilience

Subjects: Environmental Studies

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The Recipes for Resilience project demonstrates the possibility of partner-led youth engagement that uses agrifood heritage as a tool for dialogue on climate adaptation, justice, and resilience. The project drew on innovative arts and humanities methods to increase Caribbean youths' awareness of agrifood heritage and its importance for climate-change action. In the Caribbean, music has long been a source of cultural retention and transfer. As a creative methodology, music has the capacity to bring people together to explore a common problem and voice concerns by telling stories in a creative way. In line with the oralized cultures that exist in the Caribbean, music was used to stimulate participating youths' interest in Afrodescendant and Indigenous foodways and to inspire them to take climate action by enhancing food security through traditional knowledge. The affective impact of music and its ability to transmit stories and evoke awareness through emotive appeal, was reflected in the final workshop, as sensory cues triggered memories and encouraged participants to discuss traditional foodways and reflect on sustainable food practices that, for some, were lost but not forgotten.

Keywords: food heritage ; climate change ; climate action ; climate justice

1. Background

Climate change has caused widespread adverse impacts and irreversible damage to ecosystems, human and animal lives, and habitats everywhere ^[1]. However, the effects of climate change are experienced disproportionately across different geographies ^[1] and along the lines of gender, race, and class ^{[2][3][4]}. The root causes of climate change include systemic issues resulting from colonialism, capitalism, and conjoined racial and structural inequalities ^{[5][6][7]}. Global food systems, deeply implicated in plantation histories, environmentally destructive practices, and the long-term industrialization of food and agriculture, are also major drivers of carbon emissions ^{[8][9]}. In the Caribbean, where the legacies of the plantation economy continue to shape human and environmental relationships, climate change is identified as a major threat ^{[10][11]}. The region's high vulnerability to climate change is evidenced by eroding coastlines, rising sea levels, bleached coral, and exposure to frequent and more intense droughts, storms, and floods ^[12]. Such climate-related catastrophes have disrupted lives, livelihoods, ecosystems, economies, infrastructure, and property and have exacerbated long-term patterns of food insecurity ^{[13][14][15]}.

Race, place, gender, and class shape people's awareness and concerns about climate change as well as their own contribution to the problem. In places where carbon emissions are high, people are likely to be aware of climate change but less likely to feel its immediate effects ^{[16][17]}. By contrast, in places with low carbon emissions, climate change has very real and affective consequences on people's lives and environments. In all places experiencing racial and structural inequalities, the struggle to maintain or improve one's living circumstances may impede the adoption of climate action in everyday life. Indeed, climate change may be located outside of, rather than embedded in, everyday habits and routines. In the Caribbean, publics *are* aware of climate change, as first-hand witnesses but also as subjects of an increasingly diverse array of information about the effects of climate change on their environments. Yet, because of the challenges outlined above, this awareness does not always influence everyday decision-making.

2. Music and Affective Communication: Challenges and Opportunities for Changing Food Behaviours

Art forms produce subjectivity and enhance community by drawing on common experiences; in this way, music and other art forms can shift collective knowledges ^[18]. The Recipes for Resilience research team decided to employ music as an affective art form, since music is prevalent throughout the Caribbean and permeates the everyday lives of Caribbean youth. In the affective sciences, which is an interdisciplinary field exploring the emotional and affective processes, their bodily, neurological, and social causes and effects, 'affect' is a term which encapsulates various moods, emotions, and

preferences ^[19]. Drawing from Spinoza and Deleuze, Hickey-Moody describes affect as the force that moves people: a 'hunch' or a 'visceral prompt' that can be elicited through art to change how people feel and what people are able to do ^[18] ^{[20][21][22]}. According to Spinoza's philosophy, art teaches people how to feel and these feelings have a politics ^[23]. Through their ability to create a language of sensation, artworks 'can propel the political agendas of those for whom they speak ... readjust[ing] what a person is or is not able to feel, understand, produce and connect' ^[18] (p. 88).

Music has long enabled a deep engagement with politics, and this includes environmental politics. Exploring the role of music festivals in environmental sustainability, Brennan et al. demonstrate the power of songwriting to tease out underlying tensions and inherent contradictions ^[24]. They illustrate that the creation and dissemination of music in festival communities 'makes audible the tensions between economic or cultural sustainability and environmental sustainability' ^[24] (p. 272). Similarly, composer John Luther Adams, whose emotive music draws inspiration from their Alaskan environment, argues that 'music can contribute to the awakening of the ecological understanding' and can 'provide a sounding model for the renewal of human consciousness and culture' by deepening the awareness of people with their environment ^[25] (p. 1). Music has the capacity to contribute to trauma recovery and build resilience ^{[26][27][28][29][30][31]}, facilitating a range of attitudes and behaviours ^[32] and leading to beneficial social change and positive beliefs about one's self and culture ^[33]. Music can help people communicate by overturning social hierarchies and transmitting information in an easily accessible way.

The use of songwriting as a method went beyond engaging and helping young people to communicate. It also provided a voice to the marginalized (e.g., Indigenous youth), promoting equality and inclusion, policy dialogue, and community mobilization ^{[34][35][36]}. Odena illustrates how school-based music education offers effective ways to address prejudices amongst young people from different communities ^[37]. Moreover, studies investigating the benefits of music engagement for young people have demonstrated the positive cognitive, emotional, and social benefits derived from participation in musical creation ^{[38][39][40][41]}. Speaking of the relationship between music and sustainable development, James Edwards suggests that 'both are methods of negotiating with time and the existence of the Other, who is subject to the same conditions of finitude as the self' and that 'both are grounded in hope' ^[42] (p. 142).

The multi-dimensional impact of music, and its ability to transmit stories and evoke awareness through emotive appeal, was evidenced in the final workshop, as sensory cues triggered memories and encouraged participants to discuss traditional foodways and reflect on sustainable food practices. This was very exciting for the research team since the 14-20-year-old age group targeted by the project has been notoriously difficult to reach when it comes to changing environmental and food behaviours. This is particularly the case in the Caribbean, where neoliberal foodways intersect with plantation legacies. As in other places, neoliberal policies and strategies in the Caribbean have increased corporate interest and consumer demand for imported and nutrient-poor fast food, narrowing the interest in and use of locally produced, nutrient-rich foods such as yam (Dioscorea spp.), cassava (Manhiot esculenta), plantain (Musa paradisiaca), and breadfruit (Artocarpus altilis) which may be recategorized as 'climate-smart' foods [43]. These consumption patterns are especially acute in the Caribbean, where plantation legacies have led to the denigration of so-called 'slave foods' [44] by younger populations, who have seen their elders struggle to sustain rural livelihoods in the face of many hardships. Foods such as plantain, breadfruit, and yam are placed at the bottom of a status hierarchy, which arguably began with status-based distinctions between the foods planted and eaten by enslaved peoples in the field and the more valued, imported foods available to house slaves on sugar plantations [45]. There is a related tendency in some places in the region to devalue locally produced foods, subsistence agriculture, and higglers' produce markets as 'going back' to slavery [46].

These negative evaluations of traditional food and agriculture have been variably adopted by Caribbean peoples and, in some ways, are present in plantation economies across the world. Modernist food hierarchies derived from colonization partially explain why obesity is prevalent among wealthier populations in the majority world, who are eating high-status foods ^[42] that also have high carbon footprints or high levels of imported carbon risk, such as corn-based processed foods ^[46]. There is a general aspiration among younger populations in the postcolonial world to eat in this way, and such behaviours are part of what Corbett and Clark have framed as the 'super wicked problem' ^[48] of climate change.

Yet, this is not the whole story. A crucial part of the Recipes for Resilience project has been to uncover locally produced foods that enabled Caribbean people to survive in face of past and present challenges, as seen for example in the agrifood-heritage stories gathered from Belize, Trinidad and Tobago, Jamaica, Saint Vincent, and the Grenadines, Barbados, Saint Kitts, Antigua and Barbuda, Montserrat, Guyana, and other former plantation economies of the Caribbean. The project has enabled people to understand and share the perspectives of a diverse group of Caribbean youth and elders participating in workshops, who have a wealth of knowledge about the agrifood heritage of the Caribbean and its possibilities for sustainable-food-system transitions.

3. Caribbean Food Heritage: Past and Present

3.1. Indigenous Caribbean Agrifood Heritage

The Caribbean has a diverse agrifood heritage that combines African, Asian, Indian, European, and Indigenous knowledge about agriculture, cooking, and healing, which, in some ways, overturns the racial-status hierarchies engendered in colonial encounters. Foods such as yam, okra (*Abelmoschus esculentus*), cassava, plantain, rice (*Oryza sativa*), and chicken provided sustenance but also fostered autonomy, resistance, sustainability, and agrobiodiversity and enabled enslaved peoples to stay connected to their ancestral roots in West and Central Africa ^{[49][50]}.

The Caribbean has long been a dynamic space for migration, and this is reflected in its remarkably diverse food heritage. While Neolithic humans were not the first people to arrive (Paleolithic peoples had previously resided in the region ^[51]), they left a clear mark on Caribbean foodways, from their arrival around the year 300 BCE. The Neolithic groups were the Tainos and the Kalinagos. Their diet consisted of a blend of foods accessed through wild harvesting, cultivation, hunting, and fishing. Indigenous Caribbean peoples cultivated cassava, maize, and sweet potatoes on raised mounds called conucos. As seafaring people, they consumed various types of fish, shellfish, crabs, oysters, and conch. On land, they hunted small birds and animals, such as the iguana, the agouti, and, occasionally, small dogs ^{[52][53][54]}. Elements of present-day Caribbean cuisines have been influenced by these Indigenous traditions. These include bammy, a flatbread made from cassava, and jerk pork or chicken, both common in Jamaica. The Tainos and Kalinagos thrived for over a millennium before the arrival of Columbus, with no sign that their presence caused destruction of the islands' biodiversity, suggesting that they practised sustainable agricultural, hunting and fishing practices ^[55].

While decimating most, *but not all*, of the Indigenous populations (there is currently a revival of self-identified Taino and Kalinago communities across the Caribbean today; e.g., see this story of the Jamaican Hummingbird Taino and Maroon peoples: <u>https://jamaicans.com/meet-kasike-the-taino-chief-for-the-jamaican-humming-bird-taino-people/</u>, accessed on30 April 2022), the 'Columbian Exchange' ^[56] disrupted and transformed Indigenous ways of life. Colonization led to an ever-increasing reliance on external foods, technologies, people, and knowledge. The introduction of sugar plantations from the 15th century onwards destroyed forested areas, disrupted sustainable subsistence practices of Indigenous peoples and denied, on the basis of racial and colonial dominance, local food sovereignty, as all the best lands were predominantly used to cultivate monocultural cash crops for export ^{[55][57]}.

3.2. Afro-Caribbean Agrifood Heritage

With the rise of the transatlantic trade in enslaved peoples came new migrations, new population demographics, and new foodways $^{[49][58]}$. Enslaved Africans brought culinary traditions to the 'new world', such as fufu, or pounded, cooked yam, which was shaped into balls and then dipped into sauce. Enslaved people learned how to use 'new world' plants to make African recipes $^{[59]}$, such as the use of cassava, an Indigenous tuber, for Jamaican bammy. Cassava was also used to make fufu, a substitution that illustrates how new food ingredients were utilized to recreate familiar dishes. While fufu became a regular staple for enslaved peoples $^{[60]}$, the dish was time-consuming to produce. The brutal imperatives of the sugar plantation demanded continuous production, with enslaved peoples forced to labour for 12 h a day, six days a week. It was yam, boiled or roasted, along with imported salted meats and salted fish, that provided the energy necessary to fuel this labour. These foods were accompanied by greens grown by the enslaved in their small gardens $^{[50]}$.

As Wilson Marshall argues: 'From the beginning ... the foods of African descendant people in the Americas were profoundly embedded in broader social systems of control and resistance' ^[61] (p. 73). Although disadvantaged and oppressed, enslaved people were resourceful. Diane Wallman examines the creative ways in which enslaved people supplemented the meagre estate provisions they received ^[62]. This included raising small livestock and fishing. Judith Carney's and Sylvia Wynter's works discuss how the 'slave grounds' or 'plots' were used to maintain African cultural, agricultural, and medicinal practices ^{[49][50][63]}. Sustained through the creation of 'food forests' in the provision grounds of enslaved people, such food-production and provisioning practices supported healing and knowledge systems that countered the violence of life on the plantations ^{[64][65]}. They also proved useful during periods when imported foods became scarce due to warfare or natural disasters ^{[61][66]}. Such is the story of the humble breadfruit. During the American Revolutionary War (1775–1783), Britain restricted trade in foodstuffs from its 'rebel' North American colonies to its Caribbean colonies, and with rising food insecurity on islands such as Saint Vincent, breadfruit was imported to help feed the enslaved. Originating from Tahiti in the Pacific Islands, breadfruit is now part of the national dish of Saint Vincent and the Grenadines, although few people know of this colonial-era heritage.

3.3. Asian Caribbean Agrifood Heritage

The coming of the East Indians and the Chinese, as well as other groups in the post-Emancipation period, enriched Caribbean agrifood heritage. Although foodways were already well defined in the region, post-Emancipation immigrants added their own foods and practices to what was already known, thus expanding the repertoire of foods available for consumption and opening up additional avenues for earning income. Indian and Chinese immigrants joined African Jamaicans in market gardening. Indians planted vegetables such as cabbage (*Brassica oleracea* variety *capitata*), lettuce (*Lactuca sativa*), beet (*Beta vulgaris* subspecies *vulgaris*), eggplant/aubergine (*Solanum melongena*), and callaloo (*Amaranthus* spp.) on rented plots and sold their produce to Chinese shopkeepers. Indian women sold their foods as street traders ^[67]. Herbs, spices, and condiments from the range of cooking traditions present in the region, as well as from countries such as Germany, Portugal, and Syria as well as the Asian continent, extended food choices and also added to the provisions grown and sold from market gardens.

3.4. Preserving Caribbean Agrifood Heritage through Stories

With recent globalization and the growth of the fast-food industry, some of the survival strategies that allowed Afrodescendant, Asian, and Indigenous Caribbean groups to navigate scarcity and natural and human-made disasters and to claim some autonomy has been lost, *but not entirely*. Through youth engagement with storytelling and music, the Recipes for Resilience project sought to reclaim some of this agrifood heritage. For instance, the project highlighted the story of enslaved women from Suriname plaiting African rice into their hair before escaping the plantations. This rice was then used to sustain a Maroon community of free and escaped slaves in the mountainous terrain of Suriname. Another story is about yam, which came to the Caribbean on slave ships and is a climate-resilient crop, as the plant produces its carbohydrate-rich tuber underground. Similar stories of survival and social and climatic resilience through the creation of Afrodescendant food networks were shared through the project workshops, representing places across the Caribbean. Interested readers can explore the stories shared in the project workshops through the story maps provided on the website (caribbeanfood4climate.com).

In line with recent findings from Europe ^[68], the research started from the premise that such agrifood heritage stories have the power to bring Caribbean youth together, reconnect them with their elders, and encourage action for climate-change adaptation and resilience by building a sense of identity and community. In contrast with the majority of climate-change narratives, which tend to emphasize the vulnerability of island nations ^[69] and represent local communities and, especially, children as victims ^[70], the R4R project aligns with a growing body of research that reveals the unique capacities of island nations and their youth to participate directly in global climate-change preparation, adaptation, and mitigation efforts ^{[71][72]}. Moreover, Indigenous ecological knowledge held by elders in Caribbean communities can make substantial contributions to global attempts to keep the average rise of global temperature at 1.5 °C or lower ^[74]. The R4R project countered narratives of vulnerability and victimhood by emphasizing the power and potential of Caribbean agrifood heritage as a unique common ground that can bring together Caribbean people from different regions, generations, classes, races, and genders to discuss the future they want by learning from the past.

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