Culinary tourism and post-pandemic travel: Ecosystem responses to an external shock

Milwood, Pauline A.; Crick, Anne P.

Veröffentlichungsversion / Published Version
Zeitschriftenartikel / journal article

Culinary tourism and post-pandemic travel: Ecosystem responses to an external shock

Pauline A. Milwood
Pennsylvania State University, USA

Anne P. Crick
The University of the West Indies, Jamaica

Abstract:
***Purpose**: The COVID-19 (SARS-CoV-2) global pandemic forced hospitality and tourism service providers to respond by pivoting business models in line with governmental restrictions to curb the spread of the virus. This paper explores the online responsiveness of tourism-affiliated culinary service providers to a major external disruption.*
***Methods**: This study uses ecosystem resilience and Internet marketing theories to analyze 139 web homepages of culinary tourism service providers promoted by the official tourism website of Jamaica, to measure of Jamaica to measure online responsiveness to the COVID-19 pandemic.*
***Results**: Findings show that web page responses vary between the official tourism web page and the restaurants promoted on its site. Responses also vary across restaurant affiliation clusters and across location clusters. Further, resilient web page responses are more commonly associated with hotel restaurants and eponymous restaurants.*
***Implications**: Culinary service providers promoted by the official tourism marketing arm of a destination should consistently practice resilient online marketing response to external shocks. This study provides a novel analysis of online responsiveness to COVID-19 and contributes a summary framework for resilient response by culinary ecosystem providers preparing for post-pandemic travel.*

Keywords: *COVID-19 (SARS-CoV-2), culinary tourism, ecosystems, Jamaica, resilient, external shock*

JEL Classification: *H12, L66, R41*

Biographical note: Pauline A. Milwood (pam325@psu.edu) is an Assistant Professor at the Pennsylvania State University, USA. She holds a Ph.D. (Business Administration) from Temple University. At Penn State, she teaches courses in Entrepreneurship, Strategy, Operations Management, and Food Production and Service Management. Anne P. Crick (anne.crick@gmail.com) is a Senior Lecturer in the Mona School of Business & Management, The University of the West Indies, Jamaica. She teaches courses in Organizational Design & Behaviour and Service Management. She is currently writing a book on Peer-to-Peer Hospitality in Jamaica. Corresponding author: Pauline A. Milwood (pam325@psu.edu)

1 INTRODUCTION

The COVID-19 (SARS-CoV-2) pandemic inflicted a massive external shock on the human population. While, at the time of this writing, there is new hope as vaccines have been developed, the impact of COVID-19 continues to be experienced socially and economically (Fotiadis et al, 2021). Mitigation strategies to prevent the spread of the virus have dealt lethal blows to almost every sector and industry but the impact of these strategies has been particularly hard within the travel, tourism, and hospitality industries (Polyzos et al, 2020).. Culinary service providers such as restaurants, dining and drinking establishments have experienced extensive losses arising from new regulatory guidelines for operations and service; limits on capacity and recurring curfews related to curbing the spread of the virus.

In preparation for the anticipated return to pre-pandemic normal, culinary service providers, particularly those which cater to international visitors in tourism-dependent locales like Jamaica, will need to extend and exemplify service levels which account for safety protocols and practices among employees and guests. These eating and drinking establishments will also need to effectively communicate safety protocols pre-trip, during visit, and post-trip given that visitor groups with the elderly and young children will have a heightened sense of safety awareness and expectations for trust once they visit a food service establishment.

The 'official' tourism destination website is an important Internet marketing medium through which governments promote their destinations, usually under the leadership of a national or regional tourism office, destination marketing organization (DMO) or convention and visitors bureau (CVB). These sites contain information on destination

ISSN: 2529-1947. UDC: 658.8+338.48+339.1+640(05)
http://doi.org/10.5281/zenodo.4516562
Published online: 15 February 2021
www.jthsm.gr

activities ('things to do'), dining, entertainment, cultural and heritage sites, and promotional hyperlinks to tourism service providers; all used by visitors to plan their trips to a destination. In recent times these pages have become important conduits for information related to border entry/exit, travel authorizations, restrictions and regulations related to the COVID-19 pandemic. The quality and quantity of information on these pages help shape visitors' perceptions of destination safety protocols and motivate travel decision-making and intentions.

This paper analyzes the official tourism web page of Jamaica, the Jamaica Tourist Board's (JTB) https://www.visitjamaica.com, and hyperlinked pages to culinary tourism providers promoted by this page to understand the response to the external shock of the COVID-19 (SARS-CoV-2) global pandemic. It is estimated that tourism contributed 35% to Jamaica's GDP and this was expected to fall by 9% as a result of COVID-19 (UNCTAD, 2020). This decline was a blow to the tourism industry which had achieved record growth in the previous year and was expected to continue that growth (Bartlett, 2021; Linton, 2020). Jamaica is therefore representative of the challenges faced by SIDS and the need to respond to these challenges effectively.

Relying on ecosystem resilience and Internet marketing theories, the study has three important objectives: 1) evaluate online responsiveness of Jamaica's culinary tourism ecosystem, defined as the collection of JTB promoted establishments engaged in providing gastronomical tourism services to domestic and international visitors, to COVID-19; 2) use resilience-based response characteristics to provide a framework for policy and planning recommendations as Jamaica prepares for the post-pandemic traveller; and 3) provide Caribbean-based tourism scholarship and insight, sometimes overlooked by global monitors, as a key pillar of Jamaica's social, cultural, economic and environmental development.

The research presented here is significant given its potential to provide practical insight into the operational and marketing response of a select group of tourism actors to a major external shock such as a global pandemic. By carefully analyzing pandemic-motivated content of web homepages, the study is able to measure the extent to which culinary service providers align their online responses with the government-run tourism sites which promote them. The study also considers the extent of similarities and differences among clusters of culinary service providers. Such alignment is critical given that tourists experience a destination as a seamless, interdependent whole, rather than as compartmentalized 'units' of dining, lodging, and recreation. Previous studies have utilized discourse analysis to understand tourism destination risk perception and online media. These include Shroeder (2014) and Shroeder and colleagues (e.g., Shroeder et al., 2013; Cahyanto et al., 2016) who studied traveler risk perception related to the 2014 Ebola crisis and attendees' perceptions of crime vis-à-vis the 2012 London Olympic Games. Other studies (e.g., Avraham, 2020; Jeon et al., 2018) assess DMO webpage experiences and repair and responsiveness to the threat of global terrorism. This paper responds to the need to address responsiveness to the COVID-19 pandemic which served to bring global economic and social activity to a virtual halt in March 2020.

2 BACKGROUND LITERATURE

2.1 Culinary tourism and destination marketing

Culinary tourism refers to the "intentional, exploratory participation in the foodways of an 'other'—participation including the consumption, preparation, and presentation of a food item, cuisine, meal system, or eating style considered to belong to a culinary system not one's own" (Long, 2004: 21). In their umbrella of culinary tourism niches, Miller and Washington (2020) include dining, culinary destinations, culinary tours / sampling tours, culinary arts programs, restaurants at tourist attractions, food and wine festivals, winery tours, rum tours, whiskey and bourbon trails. Along with community-based food trucks, independent 'culinary walks', and other food-based events, these examples demonstrate how food and beverage elements are positioned as hedonic features of a destination experience (Kim & Eves, 2012; Kivela & Crotts, 2006; Seo et al., 2013). Further, culinary tourism has the unique impact of blending the social, cultural, and environmental heritage elements of a destination within a single experience (Agyeman et al., 2017; Spyridou, 2017). This may involve facilities such as restaurants, events such as food festivals and activities including food trails and tours as categories of food tourism. Culinary tourism services therefore play an important role in introducing tourists to local flavours and different cultural traditions of the destination.

Destination branding is intricately intertwined in the promotion of food as experience of a destination's local culture and image (Seo et al., 2013; Sthapit et al., 2020). Lai, Khoo-Lattimore & Wang (2017) argue that the image of a destination is the overall impression that one has of a destination and it is increasingly applied to food and cuisine as an indication of the success of the destination's branding. In testing the effects of culinary brand equity dimensions on foreign tourists' perception and travel intentions to Taiwan, Horng et al., (2012) found strong, positive support for the relationship between perceived quality and travel intention and between brand image and travel intention. Kim and Eves (2012) embarked on scale development and validation of five motivational dimensions of local food consumption. While both studies evidence gastronomy as important to destination branding, they are limited to consumer-side viewpoints and ignore tourism-producer analysis.

Other studies have focused on the role of destination governments and specifically quasi-governmental destination management organizations (DMOs) in pursuing policy and strategic marketing planning to promote the cultural identity of a tourism destination through cuisine, gastronomy, and culinary heritage features. (See for example, Ab Karim & Geng-QingChi, 2010; Hashimoto & Telfer, 2006; Horng & Tsai, 2010). Recognizing food as a significant 'pull factor' which influences tourist choice, Nelson (2016) analyzed online narratives of the 'official visitor site' of Houston, Texas—the Greater Houston Convention and Visitors Bureau (GHCVB) and found that 'restaurant promotion' pages are used to create an attraction for visitors looking for a local food experience and to generate new interest in the city as a destination. Focusing on government role in promoting culinary tourism, Horng and Tsai (2010) studied government tourism websites of six East Asian

countries: Hong Kong, Japan, Korea, Singapore, Taiwan and Thailand. The study focused on website dimensions of food culture, local cuisines, and culinary tourism marketing strategies. Using qualitative investigations into the culinary content posted on the government websites, they found both differences and similarities among the approach of these sites in supporting and promoting culinary tourism. With the exception of Kim & Eves (2012), which considered visitors health benefits of local foods, these studies largely ignore the health and safety aspects of food. Given the expected post-pandemic travel boom (Clarke et al., 2020), destination branding studies of online messaging for safety in culinary tourism are critical.

2.2 Tourism ecosystems

Ecological and systems theories have allowed us to conceptualize the tourism destination as an ever-evolving space comprising concrete (physical) and abstract (virtual) dimensions of interactions among host actors and guest actors (Milwood & Maxwell, 2020) involved in the production and consumption of tourism services. Host and guest interactionist principles form the basis of the tourism ecosystem space. These interactions occur between hosts and guests in face-to-face and technology-mediated environments, and align with symbolic interactionist principles (Blumer, 1969) which posit that individuals formulate views of the world based on interactions with significant others, whether in person or via social media platforms. Further, in wine-producing regions of New Zealand and Australia, cultural ecosystems emphasize the role of cultural and heritage as value-added to 'winescapes', food events and festivals (Robinson & Sigala, 2019). These authors highlight the critical interrelatedness and interdependence of actors within the destination ecosystem, as well as their vulnerability to externalities (disruptions, shocks), beyond the destination's physical and virtual boundaries and argue for collaboration and co-creation strategic behaviours among actors.

Williams et al. (2020) call for tourism scholars to utilize symbolic interactionist frameworks to study interactions between guests and hosts to explain how travelers assign meaning to place and counter dis(information) related to COVID-19 pandemic. Ultimately, the construction of such meaning determines travel decision-making and behaviors within a destination.

In the post-2020 global travel era, it is likely that destinations which have positioned culinary attractions as a key feature of the experience will need to communicate effectively in order to reassure prospective guests before, during, and after trip experiences. Safety of food supply and food systems, as well as the safety of those engaging in delivery and consumption of food services are increasingly important. Within regions like the Caribbean, where 'farm to fork' has been popularized, the safety measures and communication of these measures to the public is critical. (Matiza, 2020; Rizou et al., 2020).

2.3 External shocks and response

External shocks or disruptions may be positive or negative. Positive external shocks include technology opportunities for destination ecosystems, while negative external shocks include natural or man-made disruptions such as the COVID-19 pandemic. Similar to natural (e.g., tsunami, hurricane) and man-made (e.g., oil spill, terrorism) disturbances experienced by a biological ecosystem, the tourism destination ecosystem experienced a major external disruption resulting from the COVID-19 global pandemic triggered by the SARS-CoV-2 virus. There are two possible conditions which may describe an ecosystem's response to an external shock: resistant or resilient (Downing et al., 2012; Roundy et al., 2017). The resistant response to a disturbance describes the extent to which an external shock leaves unchanged the ecosystem i.e., minimal impact. The resilient response to a disturbance describes the extent to which in response to an external shock, an ecosystem can return to its original, pre-shock state.

Resilience principles have been widely applied to ecosystems contexts across multiple disciplines. Sustainable ecotourism development studies (e.g., Choi et al, 2017; Choi et al., 2021) advance resilience principle-based systems thinking approach to social ecological ecosystem contexts (e.g., wildlife habitat; wetlands) in response to external stresses and resource depletion over time. Another recent ecosystem theory study (Snow et al., 2021) analyzes agri-foods systems in New Zealand and Australia; and argues that the resilience of these systems is related to underlying social and cultural/economic/environmental sub-systems which supported the system as it responded to the external shock of COVID-19. These authors argue behavioural science theories of the resilience concept, identifying three characteristics of resilient people: 1) capacity to accept reality; 2) strong belief in capacity to succeed and improve; and 3) high degree of ingenuity and innovativeness (Coutu, 2002). These underlying notions of resilience form the theoretical and analytical lens through which this study viewed.

3.4 Rationale

Tourism is highly labour intensive, accounting for 17% of direct employment in the Caribbean region (ECLAC) and therefore it is not surprising that COVID-19 has had a comparatively larger impact on the global hospitality, travel and tourism industries than other service industries (UNWTO Policy Brief). While automation has filled some gaps in service providers' ability to meet guests' needs, personalized and proximate nature of culinary services remain important service quality elements (Ottenbacher & Gnoth, 2005; Arrifin & Maghzi, 2012; Gadelrab & Ekiz, 2019; Kandampully & Solnet, 2019). The pandemic's impact is especially felt in tourism-dependent regions such as the Caribbean and other small island states (Crick, 2018; Nicely et al., 2015) whose economic mass relies almost exclusively on the industry's ability to earn foreign currency revenues and stimulate output. Jamaica's tourism economy for example, represents 9.5% of its gross domestic product and over 50% of its foreign exchange earnings. Further, with in excess of 350, 000 jobs, the industry is a key economic pillar (The Sunday Gleaner, 6th December, 2020).

Responding with resilience to the external shock of COVID-19 will therefore be critical to returning the industry to a better-than-pre-shock state given the adverse conditions operators of food establishments have endured with government-mandated curfews, capacity limits and other COVID-19 regulatory impositions (Bucknor, 2020; Serju, 2020). Moreover, Jamaica has specifically targeted culinary tourism as a part of its tourism development

(https://tef.gov.jm/gastronomy-network) and has viewed food as a vital part of its community tourism policy and as part of its 2030 Vision for the sector. Gastronomy Tourism is expected to increase the linkages between tourism and the wider economy by appealing to 'passion points' of tourists (Gordon, 2006; Mensah & Mensah, 2018).

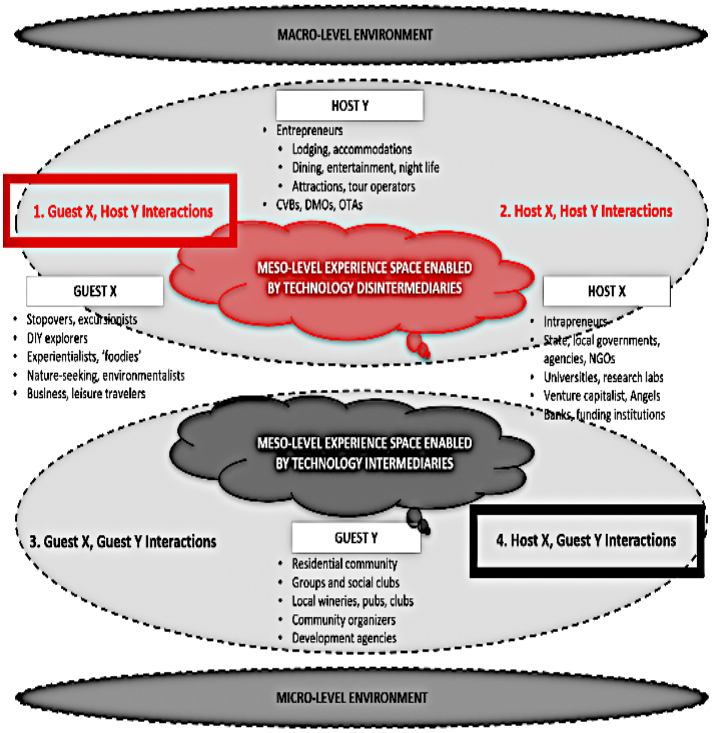
Food is such an integral part of the tourist experience in Jamaica that it is the number one word that defined Jamaica across social media platforms by visitors (Loop News, 2018). The latest available data from the JTB indicates that stopover visitors spend an average of 5.7% of their expenditure on food outside of the accommodation – an amount that the government would like to increase in order to boost the multiplier impact of tourism spend (Jamaica Tourist Board, 2018). The labour intensive nature of food and beverage hospitality also means that increases in expenditure outside of the accommodation would boost employment right throughout the value chain. Travellers can be expected to actively seek information that will reduce their risk and a lack of information about the health and safety of food was determined to be an issue by MacLaurin (2004). Henderson (2009) also found that the perceptions that good food is available as well as the absence of anxiety about food hygiene are important to visitors.

In March 2020 the Government of Jamaica issued social distancing and domestic lockdown measures in response to the WHO-announced global pandemic. In the same month the island destination closed off to arrival of international visitors and residents. Further restrictions were announced in respect of curfew, hours of operation and mandatory work from home orders for non-essential orders and stay at home orders for citizens over 65. These measures effectively closed all hotels and led to the closure of many food and beverage establishments in resort areas. In July, Jamaica reopened its borders to begin accepting international visitors with strict restrictions on movement on the island for non-nationals who are strongly urged to stay on the 'resilient corridor' which includes entities that have been certified as compliant with COVID-19 protocols.

Jamaica has put in place strict requirements for social distancing, hand sanitization and mask wearing in all public spaces. The Ministry of Tourism has gone further and developed a handbook to guide the operations of all tourism operations. The handbook relies on eight 'resilience' protocols and spells out in great detail the requirements for each area of operations including food and beverage. All aspects of the guest's food and beverage experience starting with entry and including seating, requirements for limiting contact, observing social distance and sanitization are covered. Hotels and restaurants in the resilient corridor must be certified as compliant before they are allowed to operate, and the Ministry of Health monitors adherence. While non-nationals are encouraged to stay in the resilient corridors comprised of hotels, food and beverage and entertainment establishments, strict enforcement is impractical. Further, business travellers and visiting nationals have no restrictions once they have completed their quarantine period. It would therefore be important that all food and beverage establishments whether they are affiliated with hotels or not, adhere to protocols and also signal this adherence publicly in order to reassure the consuming public. Indeed, one of the eight health and safety protocols is clear, frequent and consistent communication across Jamaican communities, workers and tourists (Ministry of Tourism Jamaica, 2020).

Understanding how the ecosystem of providers has responded thus far is important to charting meaningful and resilient social and policy prescriptions for the post-pandemic travel period. Using Milwood and Maxwell's (2020) view of the boundary objects ecosystem, this paper explores technology-mediated communications between guests and hosts (upper left (#1) and lower right (#4) quadrants in Figure 1) via the hosts online web page. We premise the work on three primary objectives: 1) explain the online responsiveness of Jamaica's culinary tourism ecosystem to the external shock of COVID-19; 2) determine important distinctions in responsiveness within and among ecosystem actors and clusters; and 3) use these distinctions to propose a response framework of relevant and actionable signaling mechanisms as the destination positions to receive the post-pandemic traveler in the near and distant futures.

Figure 1: Boundary objects ecosystem, Milwood and Maxwell (2020)



3 METHODOLOGY

Web page data comprising image, text, video elements were collected from the primary tourism web page and secondary culinary providers pages. First, the destination's primary web page was visited to determine food and beverage services offered as part and parcel of formal tourism promotion. In the case of Jamaica, https://visitjamaica.com,was used as a proxy for the destination's primary web page. This site is operated by the Jamaica Tourist Board (JTB), the official information page of Jamaica's online tourism traffic and is their primary "call to action for advertisements and promotions" (Jamaica Tourist Board, 2018). These pages, and subsequent pages, were captured using NCapture, NVivo's web tool used to

screen, capture image, text, video data from web pages and other social media sites and import into NVivo software for analysis. Using the tool as an extension to the researcher's web browser, web page data of the initial landing page and scrolling pages at https://visitjamaica.com were obtained. This allowed the capture of the primary web page experience encountered by a user of the https://visitjamaica.com page.

Second, the page was searched for text, image or video data depicting any or all of the following: "cuisine", "culinary", "dining", "eat" or "food". This data search was done via cross-checking any explicit or implicit link from the primary web page featuring "things to do"; "plan your trip"; "activities", or 'click' tabs with similar invitations. This 'click-through' process created the search trail: https://visitjamaica.com/things-to-do/activities/dining/. This process landed the search on secondary web pages which yielded search options for 139 food service providers filtered across seven regions or alternatively, 159 dining food service providers across three service categories (Table 1). The study proceeded with the seven-region filter option, given the focus on ecosystem theory and the practical nature of the research objective.

Third, the web pages of each of the (n=139) culinary service providers across the seven regions were visited. In most instances, a website link directly from the destination main JTB web page was used to visit the food service operator's web page. Where direct links were not available within the destination main JTB page, a web search was conducted for the operator's web page. NCapture was again used to cull initial and scrolling pages from each web page. Of the 139 pages found, 8 web pages indicated permanent or temporary closures. These pages were excluded from further analysis. Of the remaining 131 pages, a web page or online presence could not be found for 6 providers. These pages were excluded from further analysis. Data coding and analysis was therefore conducted on (n=125) pages.

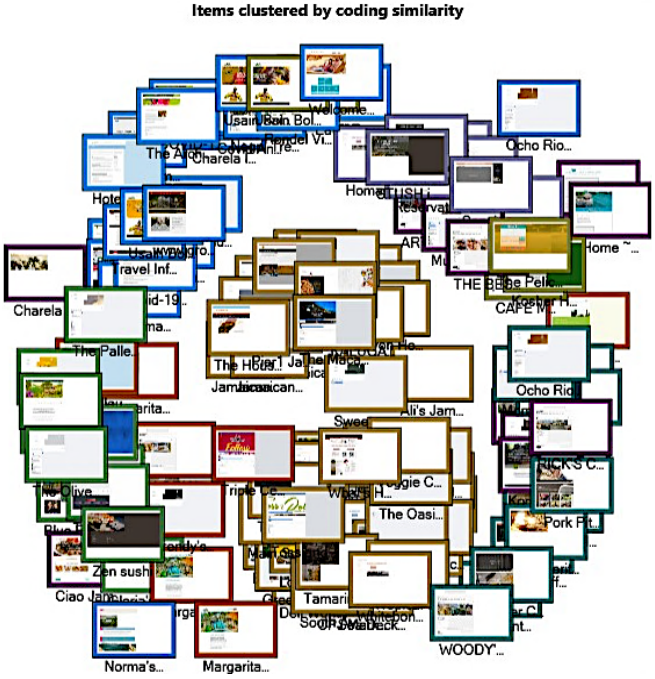
Table 1: Sample dining categories

Filter by Region (Total=139)	
Kingston (green)	80
Montego Bay (blue)	17
Negril (yellow)	16
Ocho Rios (red)	16
Port Antonio (purple)	5
South Coast (orange)	4
Other (pink)	1
Filter by Category (Total=159)	
Casual dining	118
Midscale	22
Fine dining	19

3.1 Data coding and visualization

To facilitate content coding and analysis, we followed previous studies (e.g., Cope, 2010; Nelson, 2016) which utilized an iterative process of coding text, image, video data elements for organization and theory. All web pages were imported into NVivo and coded based on the following three coding structures: 1) location; 2) response; and 3) form. Location was coded by color. Each web page representing a food and beverage service provider was assigned one of seven colors representing one of the seven regions in which the unit was located: Kingston=green, Montego Bay=blue, Negril=yellow, Ocho Rios=red, Port Antonio=purple, South Coast=orange and Other=pink. Figure 2 provides an NVivo generated image of web pages color-coded by location.

Figure 2: Web page data by coding similarity (n=125)



Response (i.e., whether there was COVID-19 information present on the web page) was coded as a binary yes or no. Each web page was coded resilient=yes or resistant=no according to whether COVID-19 response was evidenced on the page. It is important to note a reminder here that the unit of interest to the study is the web page. Evidence was coded 'resilient=yes' if the page contained any image, text, or video elements reflecting COVID-19 response. Examples include hosts/guest actors in masks; COVID-19 pop-up notifications; or social media posts concerning operating and capacity guidelines, temperature checks, mask requirements or curb-side pick-up.

Form (i.e., whether the web page landed via i. independent homepage (e.g., https://stushinthebush.com) or ii. affiliate (e.g., TripAdvisor, OpenTable, corporate chain) or social media page (Facebook, Instagram) coded each web page as 1=independent or 2=affiliate. This allowed for further visualization of the data—singularly and collectively—by allowing the researchers to detect the emergence of pattens, characteristics, or differentials within and among pages which represent larger, corporate entities (e.g., Marriott), smaller or independently owned units.

4 FINDINGS AND DISCUSSION

4.1 Culinary tourism ecosystem response to the COVID-19 external shock.

Analysis of Jamaica's culinary ecosystem, represented by the web pages of 125 culinary tourism partners featured on Jamaica's primary tourism landing page, https://www.visitjamaica.com, provides insight into the response of these actors to the external shock of the COVID-19 global pandemic. Ecosystem and Internet marketing

theories argue that macro-level destination website marketing information influence the exposure of micro-level culinary establishments within a tourism locale. The response of the culinary ecosystem, the collection of culinary service providers linked to Jamaica's main destination main web page, to the external shock of COVID-19 (SARS-Cov-2) pandemic is important to shaping the perceptions of post-pandemic travellers to the island. Moreover, appropriate alignment of information communicating safety, security and health measures between the main destination page and subsequent dining establishment pages is key to attracting new and returning visitors, especially those interested in Jamaica's world-renowned cuisine. The following paragraphs discuss key findings in the responses of Jamaica Tourist Board's main landing page and secondary web pages of linked culinary tourism service providers to the global COVID-19 pandemic.

i. Inconsistencies in COVID-19 messaging between Jamaica's main tourism destination landing page and the web pages of culinary partners

There is inconsistency between the main destination landing page and subsequent pages featuring culinary tourism services within the destination. The main JTB landing page utilizes a resilient response with instant, pop-up messaging to prescriptively market and 'interrupt' the search, alerting the user of the web page to the travel authorization and other COVID-19 information pertinent to the visit. This instantaneous messaging stands in contrast to the secondary web pages for culinary and dining providers linked to the JTB's main web page with a marked absence of COVID-19 information on some pages. Further, where COVID-19 information is presented on featured partner pages, it is presented in a more nuanced, subtle form, e.g., highlighted ticker tape across the top of the landing page.

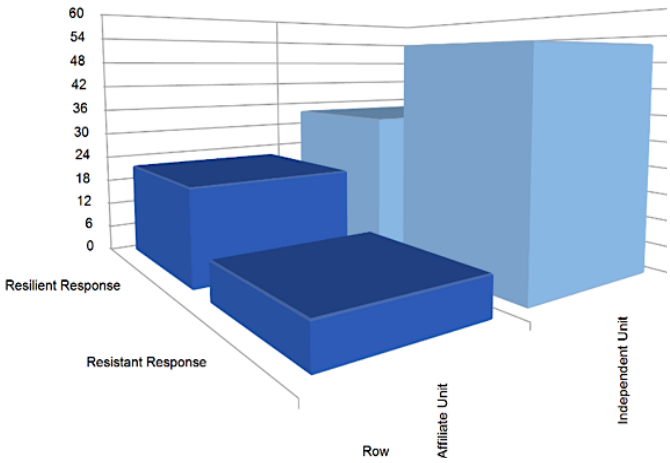
While there is resilient response in the form of COVID-19 travel notifications on the main page, this is not consistently signaled across sub-pages which promote culinary tourism services on the main tourism web page. For example, on https://www.visitjamaica.com/feel-the-vibe/cuisine/jamaican-food/, video promotions of classic cultural food elements (e.g., Edgar 'Puddin Man' Wallace; Round Hill's Chef Maginly on farm-to-fork) show pre-pandemic environments and no content communicating COVID-19 safety protocols.

ii. Web page responses vary between affiliate and independently run clusters

Figure 3 provides a chart of matrix coding results showing online response by establishment location. Matrix coding helps to discover and better understand similarities and differences (Martins, 2016; Feng and Behar-Horenstein, 2019) in online messaging responses among different groups of web pages.

Web pages representing establishments affiliated with hotel brands (e.g., The Courtleigh, Marriot, Terra Nova) or affiliated with global eponyms (e.g., Bob Marley's One Love Café, Usain Bolt's Tracks & Records) show resilient response (i.e., COVID-19 information in the form of text, images or video was present on the web page) to the pandemic. This is evidenced by dedicated links to COVID-19 information pages, instant pop-up messaging, scrolling homepages of operating guidelines and other updates. On the other hand, independent units show resistant response (i.e., COVID-19 information in the form of text, images or video was not present on the web page).

Figure 3: Matrix coding results (Response x Affiliation)



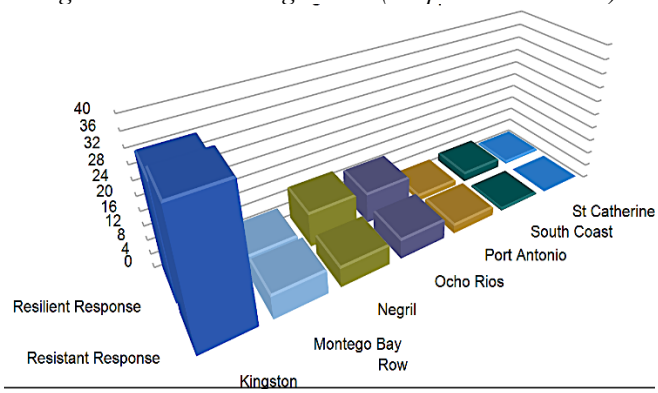
iii. Web page responses vary within and among location clusters

Figure 4 provides a chart of matrix coding results showing online response by establishment location. Of all web pages coded across all seven region clusters, 49% represented establishments with resilient responses (i.e., COVID-19 information in the form of text, images or video was present on the web page) while 51% represented establishments with resistant responses (i.e., COVID-19 information in the form of text, images or video was not present on the web page). Among these location clusters, Negril, Ocho Rios and South Coast web pages reflected more COVID-19 information compared with location clusters in Kingston, Montego Bay and Port Antonio and St. Catherine. Within each location cluster, there was also variation. Each is discussed below.

Within the Kingston location cluster of the ecosystem, web pages were split 46% and 54% for resilient and resistant responses respectively. Resilient response representations on web pages for Kingston-based establishments include links to external sites for COVID-19 updates; requirement notifications for mask-wearing, temperature checks, seating capacity and social distancing; and service-specific notes for curbside pick-up, takeout only and limited menus. Within the Montego Bay location cluster, web pages reflect 42% resilient and 58% resistant responses. Resilient response representations on web pages for Montego Bay-based establishments include additional steps being taken for sanitization and cleanliness new hours of operations, printable menus, and 'reservation-only' operation.

Within the Negril and Ocho Rios-based location clusters, web pages reflect 63% and 37% for resilient and resistant responses respectively. Several web pages linked to Negril-based and Ocho Rios-based establishments linked to TripAdvisor search results which consistently provided general COVID-19 travel information. These establishments sometimes linked to detailed COVID-19 information pages e.g., Milestone Restaurant provided "additional health and safety measures" beyond TripAdvisor's generic travel notice.

Figure 4: Matrix coding results (Response x Location)



Other responses include images of mask-wearing guests and staff, and detailed references to measures being taken by the operation 'in spite of' COVID-19 restrictions. These measures include service modifications for take-out, curbside and delivery options. The remaining web pages for clusters in less-traditional tourism locations—Port Antonio, South Coast, and St. Catherine, reflect approximately 60% and 40% resilient and resistant responses respectively. These web pages reflect resilient responses of broader, hotel affiliate COVID-19 information and broad staff requirements.

iv. Towards a framework for culinary tourism ecosystem resilience

Table 2 presents a summary response framework of responses by culinary tourism ecosystem actors to the sudden, external shock of the COVID-19 (SARS-CoV-2) global pandemic.

Table 2: A Response framework for culinary tourism ecosystem resilience

Operational Mechanism (Food/Beverage resource)	Operational Mechanism (Human resource)	
• "Our team members have received COVID-19 safety and sanitation protocols training from the Ministry of Health and Wellness" • "Touch-free greeting and welcoming protocol adopted for all team members when interacting with guests." • "Spaced out seating for social distancing in restaurants and bars." • "Reusable cups and mugs are no longer accepted." • "We have removed certain high-touch items from guest tables and bar counters such as menus, shared condiments." • "All items will be immediately sanitized before, during and after use" • "See our new limited menu!"	• "Click here for COVID-19 Safety Protocols and Updates" • "We encourage the use of reservations" • "Due to COVID-191 restrictions, [gates] will close 1 hour before any specified curfew time allotted." • "Masks are mandatory and strict social distancing protocols apply." • "Thank you for understanding the situation which is constantly changing." • "Your safety is our priority." • "WE'RE BACK! Open from 12noon to 9pm daily. Full COVID protocols enforced!"	**Marketing Mechanism (Food & Beverage resource)**
• "When dining with us, max 4 people per table." • "Dining room and bar closed until further notice." • "We are following COVID-19 protocol and are open by reservation only." • "We are eager to reopen and welcome you [and] are currently preparing and training our team with regards to comprehensive COVID-19 compliance." • "Perfect for social distancing" • "Check our 'book a visit' page for availability."	• "Call in | Pull-up | Collect." • "Our highest priority is the health, safety and security of our guests, employees, and team members." • "…we sympathize with persons who have been affected by this unfortunate event and we appreciate the government, healthcare workers, local communities and who have gone above and beyond to contain the spread of the coronavirus." • "[We] encouraged external clients to communicate with us via email and phone instead of in person." • "Temperature checks will be carried out on check-in and randomly by our team."	**Marketing Mechanism (Human resource)**

Using content from analyzed data, the response framework offers a classification of food and human resource mechanisms for host actors within a culinary tourism ecosystem to respond to environmental disruptions with resilience.

Resilience allows a culinary establishment to respond as needed, to an external disruption, while allowing flexibility for a return or pivot to pre-disruption state once conditions in the external environment resume pre-disruption normalcy (Roundy et al., 2018). The framework classifies responses as "operational and/or marketing" and "human and/or food based". Operational responses communicate changes in food-based and human-based elements of daily operation (e.g., limited- or take-out-only menus; bar service closures) while marketing responses communicate changes in food-based and human-based elements of (e.g., temperature checks, reservation-only protocols).

There are resilient responses which convey empathy and reinforce the human-to-human delicacy of marketing culinary service experiences in times of uncertainty. For example, Hotel Mockingbird Hill's Mille Fleurs states, "We want to assure you that in times of uncertainty surrounding travel, your safety and wellbeing remains our highest priority. We understand that you may be questioning your travel plans given the rapidly changing information on the Coronavirus, along with the uncertain travel restrictions." and "Thank you for understanding the situation which is constantly changing." These marketing-based mechanisms reflect the social connectedness which some establishments reflect in their online responses, and of note, occurred most often on hotel restaurant web pages.

5 CONCLUSIONS AND IMPLICATIONS

The objective of the exploratory paper is to understand the responsiveness of the ecosystem, comprising culinary tourism service providers within Jamaica, to the external shock of COVID-19. In measuring this responsiveness, the study provides a response framework for culinary tourism actors within a destination ecosystem to mount immediate and resilient responses to an external shock, such the COVID-19 (SARS-CoV-2) global pandemic.

This paper used ecological biology theories to define Jamaica's culinary tourism ecosystem as the collection of actors and interactions in order to show how destinations can experience and respond to disruptions such as natural and man-made external shocks. This paper embarked on an original research endeavor to use web page data to explore the initial response of the culinary tourism ecosystem in Jamaica to the external shock of the COVID-19 global pandemic. The survey found that at the broadest macro-level of the destination, there is instant response to the pandemic as evidenced on the destination main web page. Subsequent investigations of linked secondary web pages to one hundred and thirty-nine culinary providers show that response, as measured by the web page, is inconsistent. Hotel restaurants (e.g., Alexander's at Courtleigh, Centro at Courtyard Marriot, The Terrace at Terra Nova) and globally recognized celebrity names (e.g., Usain Bolt Tracks and Records, Bob Marley One Love Cafe) carried COVID-19 updated web page information. Notwithstanding, the majority of local restaurant brands did not carry COVID-19 updated web page information. Further, dining providers in international

traveller-heavy tourism locales (e.g., Negril, Montego Bay, Ocho Rios) carried more consistent COVID-19 information than their counterparts in international traveller-light tourism locales (e.g., South Coast, St. Catherine).

There is also a lack of consistency in the way in which the information is communicated. Some establishments such as the small and eco-friendly Mockingbird Hill adopt a reassuring tone while others adopt a more formal and business-like tone. Differences in style are to be expected because of differences in culture and individual management preferences but the differences in content communicated may make it difficult for readers to make comparisons about the protocols adopted and ultimately to make decisions about whether or not it is safe to visit the establishments.

The Jamaican government has been very proactive in establishing protocols related to tourism establishments. While the 139-page document on COVID-19 protocols is quite detailed about the actual face to face experiences in restaurants there is no mention about how to communicate these protocols to customers ahead of time. Travellers are increasingly dependent on the internet to provide them with information about the destination and this information mediates the way that travelers perceive and interact with destinations and travel products (Xiang, Wang, O'Leary & Fesenmaier, 2015). As Jamaica attempts to restart its tourism industry, it is important that the industry not only adheres to safety protocols but conveys this to the public. The JTB site contains a link to the COVID-19 handbook presumably meant to reassure visitors of the protocols in place but it is unlikely that most visitors will search through the large document which is written primarily for suppliers rather than consumers. It may therefore be useful to provide this information on the drop down menu for cuisine so that tourists who are particularly interested in that experience can immediately be reassured of a national response to the COVID-19 virus.

While the food establishments are autonomous, they form part of a larger tourist experience and the failure of any part of the chain threatens the whole. As such the management of food tourism becomes a wholistic and not an isolated perspective (Ellis, Park, Kim & Yeoman, 2018). Destination ecosystems, in order to maintain a resilient and responsive stance to COVID-19 pandemic, should therefore establish linkages with larger establishments as well as those in international tourism-heavy locations to create cohesive responses for both international and domestic travellers. Indeed, gastronomy should be viewed as a value chain, but it is a value chain that is fragmented and heterogeneous. This therefore calls for working in a collaborative way to create awareness and to provide training for all parts of the chain (World Tourism Organization & Basque Culinary Center, 2019). This will help to manage this shock by reassuring the public that all parts of the tourism sector are resilient and safe. For example, the popular cruise port of Falmouth, Trelawny should be included in the formal ecosystem by inclusion on the formal GoJ tourism destination site, and other geographic mapping identifiers. Collectively, these steps will ensure that both large and small culinary tourism providers in Jamaica are able to benefit from online branding (Chatzigeorgiou & Christou, 2020) and remain resilient and relevant in the destination-wide effort to minimize spread of the virus while maintaining consistent brand imaging.

Finally, government websites such as the JTB should consider implementing a COVID-19 certification opportunity for restaurants and dining establishments promoted on their main tourism websites. Similar to Partner Certification offered by the ATL (Sandals) Group to Caribbean-based tour operators under Sandals' Island Routes portfolio (Milwood, 2020), QTS Sign of Quality offered to local restaurants by Hong Kong Tourism Board, or Makansutra's top 15 street food markets promoted by Singapore Tourism Board; the JTB should begin a strategic partner campaign to support and promote culinary tourism service providers who have implemented and communicated resilient responses via their web page to the post-pandemic traveller.

This study has focused on Jamaica, but the findings are likely to be important for other SIDS particularly in the Caribbean which has been called the world's most tourism dependent region (Bolaky, 2011), and are likely to suffer more COVID-19 generated shock than most economies (IDB, 2020). As destinations try to diversity tourism beyond the three Ss of sand, sea and sun culinary tourism has become a key strategy. Barbados for example has styled itself as the culinary capital of the Caribbean (visitbarbados.org), Trinidad describes itself as a food lovers paradise (visittrinidad.tt) and Aruba promotes its cuisine which is inspired by over 90 unique nationalities (https://www.aruba.com/us/things-to-do/dining). As they reopen more fully these destinations will find it important to reassure visitors that it is safe to not only come to the destination, but to dine the various restaurants.

While culinary tourism has been studied extensively, this study is to our knowledge the only one to highlight the role of national websites in not only promoting the destination's cuisine but in reassuring visitors that it is safe to consume it. Horng & Tsai (2010) for example focused on the extent to which national websites could attract visitors to the culinary offerings, Mattwick & Mattwick (2018) compared food marketing strategies in Central America and Ashish and Shelley (2015) focused on the content of the sites. A glaring gap is the extent to which there is consistency and responsiveness to current concerns and issues. The study further highlights the role of national websites in working with all stakeholders to ensure consistent content that is in keeping with the objectives of the destination.

Limitations and Future Research

There are a few limitations with the present work. Given resource and natural timing constraints, the paper considers the case of a single Caribbean state. While the snapshot of the twelve-month pivot is critical and timely given the ongoing global pandemic, future work should consider comparative case analysis of other small island states. Future work should extend the study from food establishments to other culinary providers. The paper considers primarily supply-side actors within the destination ecosystem. A future study could seek to build on this work and include customer online response (Rodriguez-Diaz et al., 2018) as well as health and safety measures of the customer-manager gap between perceptions of culinary tourism providers and expectations of the post-pandemic food tourist. This would further Caribbean-based research and practice by including now-critical metrics of health, safety, and resilience of response in understanding traveller perceptions of quality, trust and destination visit intentions.

REFERENCES

Ab Karim, Shahrim, and Christina Geng-Qing Chi. "Culinary tourism as a destination attraction: An empirical examination of destinations' food image." Journal of hospitality marketing & management 19.6 (2010): 531-555.

Agyeman, J., Matthews, C., & Sobel, H. (Eds.). (2017). Food trucks, cultural identity, and social justice: From loncheras to lobsta love. MIT Press.

Ariffin, A. A. M., & Maghzi, A. (2012). A preliminary study on customer expectations of hotel hospitality: Influences of personal and hotel factors. International Journal of Hospitality Management, 31(1), 191-198.

Ashish, D., & Shelley, D. (2015). Evaluating the official websites of SAARC countries on their web information on food tourism. Asia pacific journal of information systems, 25(1), 143-161.

Avraham, E. (2020). Combating tourism crisis following terror attacks: image repair strategies for European destinations since 2014. Current Issues in Tourism, 1-14.

Bartlett, E. 2021, January 3. "Jamaica: The True Meaning of Tourism Resilience". Jamaica Observer.

Bolaky, B.A. (2011). The Competitiveness of Tourism in the Caribbean. CEPAL Review. August.

Bucknor, H., 2020, December 19. Negril's Small Businesses Taking a 'Curfew' Beating. Jamaica Gleaner.

Cahyanto, I., Wiblishauser, M., Pennington-Gray, L., & Schroeder, A. (2016). The dynamics of travel avoidance: The case of Ebola in the US. Tourism Management Perspectives, 20, 195-203.

Chatzigeorgiou, C., & Christou, E. (2020). Adoption of social media as distribution channels in tourism marketing: a qualitative analysis of consumers' experiences. Journal of Tourism, Heritage & Services Marketing, 6(1), 25-32.

Choi, Y. E., Song, K., Kim, M., & Lee, J. (2017). Transformation planning for resilient wildlife habitats in ecotourism systems. Sustainability, 9(4), 487.

Choi, Y. E., Oh, C. O., & Chon, J. (2021). Applying the resilience principles for sustainable ecotourism development: A case study of the Nakdong Estuary, South Korea. Tourism Management, 83, 104237.

Clark, P. and Newcomer, E. (2020). "Airbnb Is Banking On A Post-Pandemic Travel Boom," Bloomberg Businessweek, April 22, 2020.

Cope, M. (2010). Coding Transcripts and Diaries 27. Key methods in geography, 440.

Coutu, D. L. (2002). How resilience works. Harvard business review, 80(5), 46-56.

Crick, A. (2018). Island hospitality, services and businesses. in Tourism management in warm-water island destinations: systems and strategies, 63-74. CABI.

Downing, A. S., van Nes, E. H., Mooij, W. M., & Scheffer, M. (2012). The resilience and resistance of an ecosystem to a collapse of diversity. PloS one, 7(9), e46135.

ECLAC International Trade Series, The impact of the COVID-19 Pandemic on the Tourism Sector in Latin America and the Caribbean, and options for a sustainable and resilient recovery. https://repositorio.cepal.org/bitstream/handle/11362/46502/3/S2000751_en.pdf Retrieved January 23, 2021.

Ellis, A., Park, E., Kim, S & Yeoman, I. 2018. Progress in Tourism Management: What is Food Tourism? Tourism Management, 68, 250-63

Feng, X., & Behar-Horenstein, L. (2019). Maximizing NVivo utilities to analyze open-ended responses. The Qualitative Report, 24(3), 563-571.

Fotiadis, A., Polyzos, S., & Huan, T.-C. T. C. (2021). The good, the bad and the ugly on COVID-19 tourism recovery. Annals of Tourism Research, 87. doi:10.1016/j.annals.2020.103117

Gadelrab, R., & Ekiz, E. (2019). An investigation of key success factors for restaurant operations in Saudi Arabia. Journal of Tourism, Heritage & Services Marketing, 5(2), 27-35.

Gordon, T. 2016. "Tourism Linkage Networks Aim To Serve Five Million Visitors." The Gleaner . December 14. Accessed November 13, 2017. http://jamaica-gleaner.com/article/business/20161214/tourism-linkage-networks-aim-serve-five-million-visitors

Hashimoto, A., & Telfer, D.J. 2006. "Selling Canadian Culinary Tourism: Branding the Global and the Regional Product" Tourism Geographies, 12 (1), 31-55

Henderson, J.C. (2009) Food Tourism Reviewed. British Food Journal , 111 (4), 317-26

Horng, J. S., & Tsai, C. T. S. (2010). Government websites for promoting East Asian culinary tourism: A cross-national analysis. Tourism Management, 31(1), 74-85.

Horng, J. S., Liu, C. H., Chou, H. Y., & Tsai, C. Y. (2012). Understanding the impact of culinary brand equity and destination familiarity on travel intentions. Tourism management, 33(4), 815-824.

https://jis.gov.jm/media/FINAL-COMMUNITY-TOURISM-POLICY-AND-STRATEGY-White-Paper-April-2015.pdf; http://www.vision2030.gov.jm/Portals/0/Sector_Plan/Microsoft%20Word%20-%20Vision%202030%20Jamaica%20-%20Final%20Draft%20Tourism%20Sector%20Plan%20_Sepâ€¦.pdf

IDB, July 1, 2020. IDB report envisions devastating tourism shocks to Latin America and the Caribbean. https://www.iadb.org/en/news/idb-report-envisions-devastating-tourism-shocks-latin-america-and-caribbean . Retrieved on January 23, 2021.

Jamaica Tourist Board Annual Travel Statistics. (2018).

Kandampully, J., & Solnet, D. (2019). Competitive advantage through service in hospitality and tourism: a perspective article. Tourism Review.Kim, Y. G., & Eves, A. (2012). Construction and validation of a scale to measure tourist motivation to consume local food. Tourism management, 33(6), 1458-1467.

Lai, M.Y,, Khoo-Lattimore, C. & Wang, Y. (2019). Food and Cuisine Image in destination branding: toward a conceptual model, Tourism and Hospitality Research, 19, 238-51

Linton, L. June 25, 2020. Jamaica earned US$3.64 Billion From Tourism in 2019, Welcomed 4.3 Million Visitors, https://jis.gov.jm/jamaica-earned-us3-64-billion-from-tourism-in-2019-welcomed-4-3-million-visitors/#:~:text=Jamaica%20welcomed%20approximately%204.3%20million,destination%20earning%20US%243.64%20billion. Retrieved January 23, 2021

Long, L. M. (Ed.). (2004). Culinary tourism. University Press of Kentucky.

Loop News. (2018). Tourism Ministry pumps $20M into Gastronomy Industry. August 3 https://www.loopjamaica.com/content/tourism-ministry-pumps-20-million-gastronomy- industry. Retrieved January 8, 2021

MacLaurin, T. L. (2004). The importance of food safety in travel planning and destination selection. Journal of travel & tourism marketing, 15(4), 233-257.

Martins, M. (2016). Gastronomic tourism and the creative economy. Journal of Tourism, Heritage & Services Marketing, 2(2), 33-37.

Matiza, T. (2020). Post-COVID-19 crisis travel behaviour: towards mitigating the effects of perceived risk. Journal of Tourism Futures.

Matwick, K., & Matwick, K. (2018). Culinary tourism in central America: a cross-analysis of government

tourism websites. Journal of Culinary Science & Technology, 16(3), 286-309.

Mensah, I., & Mensah, R. D. (2018). Effects of service quality and customer satisfaction on repurchase intention in restaurants on University of Cape Coast campus. Journal of Tourism, Heritage & Services Marketing, 4(2), 27-36.

Milwood, P. (2020). Social responsibility and the SDGs: vignettes of Caribbean tour operators. Worldwide Hospitality and Tourism Themes.

Milwood, P. A., & Maxwell, A. (2020). A boundary objects view of Entrepreneurial Ecosystems in tourism. Journal of Hospitality and Tourism Management, 44, 243-252.

Ministry of Tourism Jamaica, 2020. COVID-19 Ministry of Tourism Health and Safety Protocols,: Protocols for the Jamaican Tourism Sector 2020.

Mkono, M., Markwell, K., & Wilson, E. (2013). Applying Quan and Wang's structural model of the tourist experience: A Zimbabwean netnography of food tourism. Tourism management perspectives, 5, 68-74.

Nelson, V. (2016). Food and image on the official visitor site of Houston, Texas. Journal of Destination Marketing & Management, 5(2), 133-140.

Nicely, A., Day, J., Sydnor, S., & Ghazali, R. M. (2015). Sustainably changing small traders' harassment behaviors–A theoretical framework. Tourism Management, 47, 273-285.

Nysveen, H., Methlie, L. B., & Pedersen, P. E. (2002). Tourism web sites and value-added services: The gap between customer preferences and web sites' offerings. Information Technology & Tourism, 5(3), 165-174.

Ottenbacher, M., & Gnoth, J. (2005). How to develop successful hospitality innovation. Cornell hotel and restaurant administration quarterly, 46(2), 205-222.

Polyzos, S., Samitas, A., & Spyridou, A. E. (2020). Tourism demand and the COVID-19 pandemic: an LSTM approach. Tourism Recreation Research, 1-13. doi:10.1080/02508281.2020.1777053

Rizou, M., Galanakis, I. M., Aldawoud, T. M., & Galanakis, C. M. (2020). Safety of foods, food supply chain and environment within the COVID-19 pandemic. Trends in food science & technology, 102, 293-299.

Robinson R.N.S., Sigala M. (2019) Epilogue: An Ecosystems Framework for Studying Wine Tourism: Actors, Co-creation Processes, Experiences and Outcomes. In: Sigala M., Robinson R. (eds) Wine Tourism Destination Management and Marketing. Palgrave Macmillan, Cham.

Rodríguez-Díaz, M., Rodríguez-Díaz, R., & Espino-Rodríguez, T. F. (2018). Analysis of the online reputation based on customer ratings of lodgings in tourism destinations. Administrative sciences, 8(3), 51.

Roundy, P. T., Brockman, B. K., & Bradshaw, M. (2017). The resilience of entrepreneurial ecosystems. Journal of Business Venturing Insights, 8, 99-104.

Ryan, T., Field, R., & Olfman, L. (2002). Homepage genre dimensionality. AMCIS 2002 Proceedings, 154.

Serju, C. 2020, September 23, 'Covid is not a cockroach'- Pandohie Presses for 10 P.M. Curfew, Saying Virus Isn't Night Predator. The Jamaica Gleaner

Schroeder, A., Pennington-Gray, L., Donohoe, H., & Kiousis, S. (2013). Using social media in times of crisis. Journal of Travel & Tourism Marketing, 30(1-2), 126-143.

Sigala M. (2019) Building a Wine Tourism Destination Through Coopetition: The Business Model of Ultimate Winery Experiences Australia. In: Sigala M., Robinson R. (eds) Wine Tourism Destination Management and Marketing. Palgrave Macmillan, Cham.

Seo, S., Kim, O. Y., Oh, S., & Yun, N. (2013). Influence of informational and experiential familiarity on image of local foods. International Journal of Hospitality Management, 34, 295-308.

Smith, S., and H. Xiao. 2008. "Culinary Tourism Supply Chains: A Preliminary Examination." Journal of Travel Research 46 (3): 289-299.

Snow, V., Rodriguez, D., Dynes, R., Kaye-Blake, W., Mallawaarachchi, T., Zydenbos, S., ... & Stevens, D. Resilience achieved via multiple compensating subsystems: The immediate impacts of COVID-19 control measures on the agri-food systems of Australia and New Zealand. Agricultural Systems, 187, 103025.

Spyridou, A. (2017). Perceived Service Quality and Customer Revisiting Intention: The Case of "all you can eat" Asian Restaurants in Southern Taiwan. Journal of Tourism, Heritage & Services Marketing, 3(2), 30-38.

Sthapit, E., Piramanayayagam, S., & Björk, P. (2020). Tourists' Motivations, Emotions, and Memorable Local Food Experiences. Journal of Gastronomy and Tourism, J 5(1), 17-32.

UNCTAD, April 24, 2020. Impact of COVID-19 on tourism in small island developing states, https://unctad.org/news/impact-covid-19-tourism-small-island-developing-states. Retrieved January 23, 2021.

UNWTO, Secretary General's Policy Brief on Tourism and COVID-19. https://www.unwto.org/tourism-and-covid-19-unprecedented-economic-impacts. Retrieved on January 23, 2021

Williamson, J., & Hassanli, N. (2020). Sharing, caring, learning: Role of local food in domestic trips. Tourism Analysis, 25(2-3), 2-3.

Withiam, G. (Ed.). (2016). Achieving success through innovation: cases and insights from the hospitality, travel, and tourism industry. Business Expert Press.

World Tourism Organization and Basque Culinary Center (2019), Guidelines for the Development of Gastronomy Tourism, UNWTO, Madrid, DOI: https://doi.org/10.18111/9789284420957

Wyatt, J., Brown, T., & Carey, S. (2021, Winter). The next chapter in design for social innovation. Stanford Social Innovation Review, 19, 40-47.

Xiang, Z., Wang, D., O'Leary, J. T., & Fesenmaier, D. R. (2015). Adapting to the internet: trends in travelers' use of the web for trip planning. Journal of travel research, 54(4), 511-527.

SUBMITTED: JUN 2020
REVISION SUBMITTED: SEP 2020
ACCEPTED: DEC 2020
REFEREED ANONYMOUSLY

PUBLISHED ONLINE: 15 FEB 2021