

The Influence of Role Conflict, Supervisor Support and Physical Work Environment on Job Burnout Among Hotel Chefs in Malaysia

Arnieyantie, A.H.^{1*}, Ungku Fatimah, U.Z.A.², Norfezah, M.N.³ and Hazrina, G.⁴

¹Faculty of Hotel and Tourism Management, Universiti Teknologi MARA Cawangan P.Pinang
13500 Permatang Pauh, Penang, Malaysia
arnieyanti@uitm.edu.my*

²Faculty of Food Science and Technology, Universiti Putra Malaysia
43400 Serdang, Selangor, Malaysia
ungkufatimah@upm.edu.my

³Faculty of Hotel and Tourism Management, Universiti Teknologi MARA Cawangan P.Pinang
13500 Permatang Pauh, P.Pinang, Malaysia.
norfezah420@uitm.edu.my

⁴Faculty of Food Science and Technology, Universiti Putra Malaysia
43400 Serdang, Selangor, Malaysia
hazrina@upm.edu.my

Corresponding author (*)

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Abstract

The output quality can portray the complexity of the chef's work nature in the hospitality industry in a demanding service environment. Frequently facing inconsistent demand and lack of supervisor support results in chefs likely being confronted with role conflict. Working in an unfavorable physical environment has exposed the chef to job burnout. As the job burnout phenomenon has been scarcely studied in the Malaysian hospitality context, this study aims to investigate the relationship of variables using the Job Demand Resources (JD-R) model as a foundation focusing on emotional exhaustion (EE) as the first dimension of burnout. A quantitative method approach was applied through a self-administered survey involving 440 chefs. The result showed that role conflict and physical work environment significantly influences emotional exhaustion ($p < 0.05$), while supervisor support does not influence the exhaustion of chefs. Each factor has acceptable internal reliability (Cronbach $\alpha = 0.7-0.9$) and confirmatory factor analysis result provided evidence for convergent (Overall factor loading > 0.6 , AVE > 0.5 , CR > 0.7) and discriminant validity (HTMT ratio < 0.90). The result of structural equation modeling found the proposed model predictive of emotional exhaustion ($R^2 = 0.194$, $Q^2 = 0.107$). It can be concluded that chefs responsible for many duties at a time and working in unfavorable environments tend to experience emotional exhaustion that can lead to other dimensions of job burnout. On the other hand, the positive support from the supervisor results in less stress for the chefs. The findings can assist the head of the chef in improving their system, especially on the job description and task delegation to overcome conflict. At the same time, management can focus on significant variables to combat the cause that may lead to job burnout within a hotel kitchen setting.

Keywords: chef, hospitality, role conflict, supervisor support, physical work environment

1. Introduction

The hotel, tourism, and leisure industry is a leading service industry and a significant source of economic growth in Malaysia's economy. Malaysia's hospitality and tourist business has become the foundation of the country's economic success, accounting for the third most significant contributor to GDP (WTTC, 2017). Furthermore, preliminary statistics reveal that the tourism sector contributed 94.5 billion Malaysian ringgit to the country's gross domestic product in 2018 (Hirschmann, 2020). In 2018, Malaysia welcomed 25.8 million tourists, with the tourism industry accounting for 13.3% of the country's GDP (MOF, 2019). Malaysia's tourism industry employs around 3.56 million people, or just under a quarter of all occupations, to handle the large influx of tourists. As a lodging provider for travelers and visitors, the hotel business plays a significant role in tourism.

The rapid growth of hospitality industries also indicates the tremendous job opportunity, and it is also a call to the emerging issue of the hospitality workforce's physical and mental health. Malaysia demonstrates an increasing number of executives and workers suffering from anxiety, depression, and mental stress because of their jobs and working lives (Lam Thye, 2020). Hospitality workers must bear with the nature of the service-oriented industry that demands polite behavior and appropriate emotional display (Lu & Gursoy, 2013) that tend to build stressful conditions due to the intensity of the interaction (Chuang & Lei, 2011; Kim, 2008). Moreover, the hospitality industry is also characterized by a requirement for close cooperation between departments and personnel, time pressures, elastic demand from the customer, and labor-intensive functions that leads to customer mistreatment (Cho, Bonn, Han, & Lee, 2016; Jung & Yoon, 2014; Yang, Lu, & Huang, 2020). Thus, working in this industry can be tiring (Birdir & Tepeci, 2003).

Chefs are known as a 'heart' in each hotel operation. They are also widely recognized as hospitality professionals who maintain the high quality of food service in hotel and hospitality-related operations (Chuang et al. 2009). Chefs are frequently exposed to adverse physical and psychological demands, such as tight time constraints and high perfectionism, in a hot and cramped working environment, which causes occupational stress (Murray-Gibbons & Gibbons, 2007). Furthermore, chefs must deal with culinary battle after battle and meet the high-quality expectation and mass-quantity demands of clientele daily, thus requiring highly skilled management (Chuang & Lei, 2011). As the industry faced a prolonged problem with retention, this situation has put the chef profession at risk of job burnout, has consequences of leaving the industry, causing the loss of skilled workers. Job stress, a ubiquitous phenomenon in the hospitality industry, has also been linked to employees' burnout, turnover, and service performance (Akgunduz, 2015)

Chefs have been identified as a profession widely exposed to high-stress working conditions, with nearly half of the population suffering from depression because of overwork (Yamauchi et al., 2017). According to the Nestle Professional CHEF Report (2019), eight out of ten people working in professional kitchens (81%) have had mental health issues. An employee exposed to stress in the workplace over time is commonly exposed to the core of job burnout, which is emotional exhaustion. Working in an environment facing high job demand, such as role conflict (Ariza-Montes, Arjona-Fuentes, Han, & Law, 2018) and in an unfavorable physical work environment (Kang et al., 2010) are among the contributing factors to the occurrence of job burnout among hotel chefs. In addition, the lack of support from supervisors is also said to be a contributing factor (Leiter, 2021). However, the extent to which these factors affect the job burnout situation among chefs in the hotel kitchen setting in Malaysia is still unclear and needs to be studied. Therefore, this study aimed to investigate the influence of role conflict, physical work environment, and supervisor support on emotional exhaustion among hotel chefs in Malaysia.

2. Literature Review

1.1 Job burnout Definition

It is reported earlier by Bradley (2007) that burnout is an extreme form of stress. Maslach et al. (2001) point out that employees who experience high levels of stress will tend to experience chronic emotions, and prolonged exposure will result in job burnout. Job burnout combines exhaustion, depersonalization, and low personal accomplishment into a syndrome that functions as an occupational condition undermining the quality of work life. Burnout is generally conceptualized as a chronic stress syndrome, including chronic feelings of exhaustion, negative attitudes toward work

(depersonalization), and reduced personal accomplishment (Maslach et al., 2001). Burnout has detrimental effects on both mental and physical health and is not a disease. Burnout, on the other hand, is a breakdown in people's relationships with their workplaces. People who are burned out from their jobs are no longer engaged in making a good contribution. Their personal and professional resources begin to run out as their daily work demands increase (Bakker et al., 2014).

1.2 JD-R Model

The JD-R model has been used extensively to explain the causal relationships between job characteristics and employee outcomes like burnout and intention to leave (Chen & Chen, 2014; Chen & Kao, 2012; Schaufeli, Bakker, & Van Rhenen, 2009; Wang, 2019). The JD-R model proposes that job characteristics can be categorized into two types: job demands and job resources (Bakker & Demerouti, 2007; Demerouti et al., 2001). Job demands are characterized as a job's physical, psychological, or organizational aspects that require employees continued physical and mental effort (Bakker et al., 2006; Demerouti et al., 2001). Job demands, such as a heavy workload and the need to perform quickly and efficiently, are usually associated with physiological and psychological consequences (Chen & Chen, 2014). On the other hand, job resources are the physical, psychological, or organisational aspects of a job that can help employees complete work tasks and promote personal growth (Demerouti et al., 2001). According to the JD-R model, employees may experience burnout when job demands increase (Demerouti et al., 2001) because achieving these needs involves tremendous effort. It is especially true for hospitality workers, who must balance competing for work demands and intense social interactions, both of which are linked to emotional stress (Chiang, Birch & Kwan, 2010). As a result, greater job demands are more likely to cause burnout.

1.3 Emotional Exhaustion

The first dimension of job burnout is emotional exhaustion. It is "a long-term state of physical and mental exhaustion caused by overwhelming work expectations and constant inconveniences" (Wright & Cropanzano, 1998, p. 486). It usually shows itself as exhaustion and a lack of energy to execute work tasks. Employees dealing with this issue are likely to feel emotionally exhausted and overwhelmed, especially if they are working on tasks requiring significant time and effort (Hurt et al., 2014).

1.4 Physical Work Environment

The physical work environment refers to the physical features that surround employees in the workplace, such as noise, lighting, and ventilation (Thayer et al., 2010). Noise and heat in the kitchen area represent a safety concern to kitchen personnel, particularly mental stress (Ambardar, 2013). Chefs frequently work in a stressful, insecure environment that is highly hierarchical but unpleasant to work in, according to a later study by Tongchaiprasit and Ariyabuddhiphongs (2016). McFadden (2013) discovered that catering chefs face cramped workspaces, poor ventilation, and having to work in uncomfortably high temperatures, which are physically and mentally challenging. In addition, an earlier study has reported that poor ventilation in the kitchen can change employees' mood and thus leads to problems for trivial reasons with each other and between superiors and subordinates, triggering stress (Alfatmafathalla salama, 2016). Therefore, the following hypothesis is proposed:

H1 Physical work environment influences emotional exhaustion among hotel chefs

1.5 Role conflict

Role conflict is a job demand that requires sustained physical and mental effort at work, draining energy and resulting in physiological and psychological costs (Bakker and Demerouti, 2007; Olafsen et al., 2021). Employees must be clear on what is expected from them, or otherwise, they will experience role conflict; in this situation, employees have several different and inconsistent demands. Role conflict occurs when individuals have incompatible job demands from various parties such as customers, co-workers, and managers and find that they are incapable of satisfying all job demands simultaneously. Individuals confronted with role conflict and ambiguity also experience emotional exhaustion, depersonalization, and diminished personal accomplishment (Karatepe & Uludag, 2008; Kim & Park, 2014). In their meta-analytic analysis, Lee and Ashforth (1996) found that role conflict and ambiguity were significantly and positively connected with emotional exhaustion and depersonalization. As aforementioned above, the following hypothesis is proposed:

H2 Role conflict significantly influences emotional exhaustion among hotel chefs

1.6 Supervisor Support

Supportive working conditions assist the workers in coping and reducing job stress, contributing to the feeling of attachment to their organization (Dollard et al., 2000). Social support can be defined as the supportive interactions or exchanges of resources between people, either in formal or informal relationships (House, 1981). Interpersonal and social relations in an organization, such as supervisor support, are one of the job resources. Supervisor support is one of the social support components that are significant predictors of job burnout (Halbesleben and Buckley, 2004). Existing studies have also found that supervisor support and co-worker support not only alleviate the harmful effects of job characteristics that employees experience but also enhance their psychological well-being and performance (Mayo et al., 2012; Sloan, 2012). Charoensukmongkol et al. (2016) demonstrate that a lack of supervisor support alleviates emotional exhaustion and decreases confidence and ability to accomplish employees' work objectives. Therefore, the following hypothesis is proposed:

H3 Supervisor support influences emotional exhaustion among hotel chefs

3. Methodology

The study is a cross-sectional study that employs a quantitative research design. The target population is chefs in four- and five-star hotels with justification selected hotel's ranking operation involved various types of outlets and catered large numbers of events. Due to the unknown population size, the sample size was determined using G-power software with $\alpha=0.05$. Using purposive sampling, 390 respondents were involved in this study, consisting of hotel chefs around the Klang Valley and Selangor. The questionnaire was designed by adapting and adopting the items to suit the research setting and was self-administered. The questionnaires were developed in the style of a 5-point Likert scale consisting of five sections: Part A (Physical work environment; Thayer et al. (2010); 8 items), Part B (Role conflict; Karatape & Uludag, 2008; 6 items), Part C (Supervisor support; Wong & Lin (2007); 4 items), Part D (Emotional Exhaustion; Maslach Burnout Inventory, Lammers, et al. (2013); 9 items) and Part E (Demographic profile). Partial Least Square is used for data analysis via SMART-PLS version 3.3. PLS is a structural equation model used to test the conceptual framework. SEM can be used to clarify the relationships between multiple variables (Kline, 2011).

4. Finding

Table 1 shows the demographic characteristics of the overall respondent population of 329 people. Males account for more than 70% of respondents (n=251). Around 80% of the respondents (n=264) are between the ages of 21 and 40, with the majority being Malay (80.5 percent, n=265). Chinese (9.7%, n=32), Indian (6.1 percent, n=20), and others (3.6 percent, n=12) are the other races that contribute to this industry. The majority (51.4%, n=169) are married, nearly half (45.8%, n=151) are single, and only 2.4 percent (n=8) are widowed. More than half of those who work in hotel kitchens have a diploma (53.7 percent, n=211), with secondary school (34.9 percent, n=137) coming in second. In this study, the Cronbach's alpha value of the studied variable is between 0.7 to 0.9, indicating high reliability (Periy et al. 2004).

Three primary assessment was made to assess the validity and reliability of the indicators (items), which is internal consistency (Composite Reliability/ CR) reliability, convergent validity (indicator reliability/ outer loading and Average Variance Extracted (AVE)), and discriminant validity. The factor loadings should be at least 0.40 to achieve discriminant validity (Matsunaga 2010). At least 0.70 should be the CR score, indicating how well the indicators reveal the latent construct (Hair, Hult, et al., 2013). While the average variance extracted (AVE) value should be at least 0.50, it indicates the overall variance in the indicators accounted for by the latent construct (Fornell & Larcker, 1981). Table 2 shows all item indicators with a score of 0.6 and above. The CR and AVE readings were higher than the acceptable levels of 0.7 and 0.5, respectively (Bagozzi & Yi, 1988; Hair, Hult, et al., 2013).

Table 1: Respondent Demographic Profile

Characteristic (n= 329)	N	%
Gender		
Male	251	76.0
Female	78	24.0
Age		
Below 20	4	1.2
21-35	170	51.7
36-40	94	28.5
41-55	61	18.5
Races		
Malay	265	80.5
Chinese	32	9.7
Indian	20	6.1
Others	12	3.6
Marital status		
Single	151	45.8
Married	169	51.4
Widowed	8	2.4
Education		
Primary	12	3.1
Secondary	137	34.9
Diploma	211	53.7
Degree	26	6.6
Others	7	1.8

Table 2: Result of Reliability and Convergent Validity

Factors	Code	Loading ≥0.4	CR ≥0.7	AVE ≥0.5
Physical work environment	A1	0.739	0.911	0.562
	A2	0.791		
	A3	0.655		
	A4	0.739		
	A5	0.708		
	A6	0.772		
	A7	0.788		
	A8	0.797		
Role conflict	Ba2	0.770	0.836	0.629
	Ba3	0.796		
	Ba5	0.813		
Supervisor support	Be1	0.854	0.938	0.790
	Be2	0.892		
	Be3	0.899		
	Be4	0.909		
Emotional Exhaustion (EE)	Fa1	0.649	0.930	0.599
	Fa2	0.728		
	Fa3	0.752		
	Fa4	0.817		
	Fa5	0.888		
	Fa6	0.750		
	Fa7	0.718		
	Fa8	0.832		
	Fa9	0.805		

Table 3 presents the Heterotrait- Monotrait ratio of correlations. The recently established Heterotrait-Monotrait (HTMT) ratio of correlations is a better technique for assessing discriminant validity (Henseler, Ringle, & Sarstedt, 2015) and is thus employed in this study. The HTMT value more excellent than 0.85 (Kline, 2011) or 0.90 (Gold, Malhotra & Segars, 2001) suggests a concern with discriminant validity. In this study, all HTMT values obtained, as shown in Table 4, were less than 0.90, showing that discriminant validity is not a concern.

Table 3: Discriminant Validity (HTMT)

	EE	Physical work environment	Role conflict	Supervisor support
EE				
Physical work environment	0.177			
Role conflict	0.473	0.107		
Supervisor support	0.138	0.375	0.103	

Even though the discriminant validity criteria are met, the issue of collinearity should be critically considered when evaluating the structural measurement model as it can mislead the result. The high levels of collinearity between formative indicators are problematic as they may affect the estimation of weights and their statistical significance. The high levels of collinearity between formative indicators are problematic as they may affect the estimation of weights and their statistical significance. Variance Inflation Factor (VIF) was viewed to measure the level of collinearity in PLS-SEM. Hair, Ringle, and Sarstedt (2011) reported earlier that if VIF is 5 or higher, it indicates a potential issue with collinearity problem. In contrast, VIF 3.3 or higher also indicates a potential issue with collinearity (Diamantopoulos & Sigauw, 2006). In this study, VIF values reported are 1.152 (Physical work environment), 1.011 (Role conflict), and 1.151 (Supervisor support) below the threshold of 5 and 3.3. Therefore, collinearity among predictors is not a critical issue in the structural model (Hair et al., 2017).

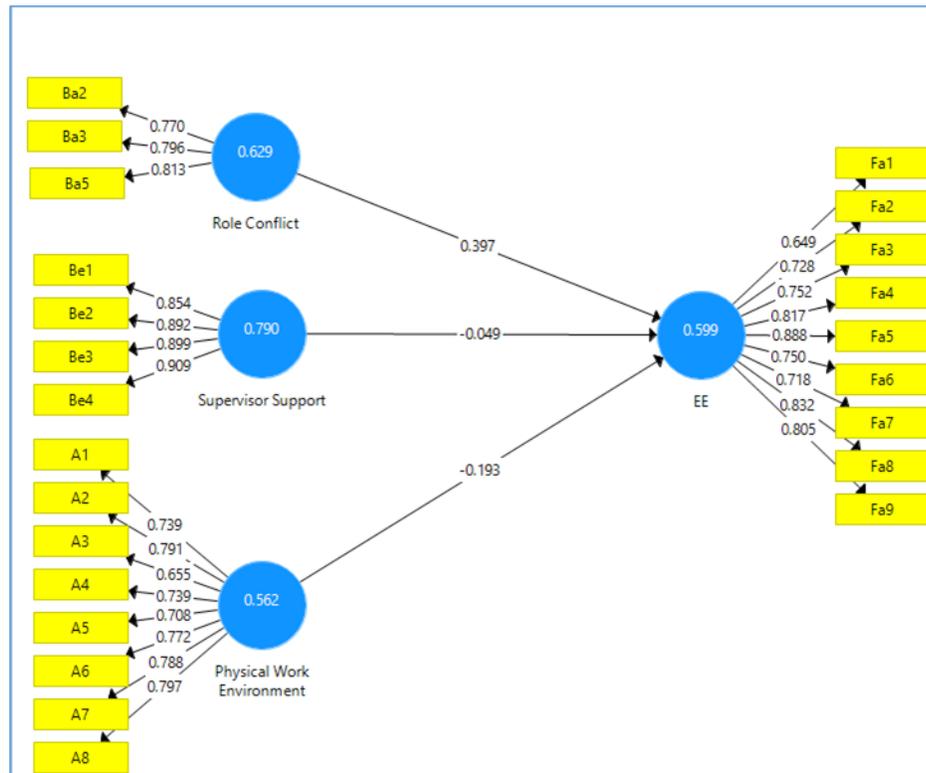
Coefficient of determination or R^2 is used to evaluate the model's predictive accuracy. The R^2 value also can be seen as the combined effect of exogenous variables on endogenous variables, representing the amount of variance in the endogenous construct explained by all exogenous constructs pointing to it. The EE (emotional exhaustion) showed the R^2 value as 0.197, considered moderate by Cohen (1988).

Table 4: Table Path Coefficient and Hypotheses Testing

	Hypotheses	Std. Beta	Std. error	t-value	p-value	Decision
H1	Physical work environment > EE	0.193	0.048	4.034	0.000	Supported
H2	Role conflict > EE	0.397	0.054	7.371	0.000	Supported
H3	Supervisor > EE	0.049	0.055	0.898	0.370	Not supported

Furthermore, the physical work environment and supervisor support showed a small effect size with the values of 0.040 and 0.003, respectively, in producing R^2 for EE. However, the f^2 value for role conflict (0.194) indicates the medium effect in producing R^2 for EE. In addition, EE's predictive relevance (Q^2) value has a value of 0.107, which is larger than 0, indicating the model has predictive relevance based on one endogenous construct. Path coefficients represent the hypothesized relationships that link the constructs. Table 4 shows the path coefficient and hypotheses testing. Path coefficients represent the hypothesized relationships that link the constructs. By referring to path coefficients at t-value > 1.645 (one-tailed), >1.96 (two-tailed), and p-value < 0.05 (Hair et al., 2017), it was reported that physical work environment and role conflict significantly influence emotional exhaustion (EE) among hotel chefs. Conversely, supervisor support does not significantly influence hotel chefs' emotional exhaustion (EE). Figure 1 shows the structural measurement model of the proposed research framework.

Figure 1: Structural Measurement Model



From the data, the result showed that both role conflict and physical work environment significantly influence emotional exhaustion among hotel chefs. These findings align with previous studies that demonstrated that both play a role in influencing job burnout. Working in a hotel kitchen, constantly faced with various work, tasks, expectations, and evaluation standards to ensure customer satisfaction. Role conflict begins when an employee's expectations and requests are inconsistent in performing the following task, leading to feeling stressed, becoming dissatisfied, and performing less efficiently (Wen et al., 2020). The findings of this study are also supported by Karatape and Uludag (2008), who reported that job burnout occurs among employees who face role conflict where role conflict has a beneficial effect on emotional exhaustion (Karatape & Uludag, 2008). Role conflict has a significant predictor of emotional exhaustion (Konstantinou et al., 2018).

Furthermore, apart from role conflict, it was found that the physical work environment significantly influences hotel chefs' emotional exhaustion. Commonly, the kitchen environment is hot, noisy, steamy, and sometimes faced with situations of lack of lighting, maintenance on equipment, and poor design and layout. Previous studies also support this study's findings that employees working in a crowded environment, such as in a large kitchen, will lower mental alertness and increase body temperature and physical discomfort, further promoting anger and emotional exhaustion (Logeswari & Mrunalini, 2017).

However, the opposite situation is found where supervisor support does not significantly influence emotional exhaustion in a hotel kitchen setting in Malaysia. This finding can be related to the satisfaction among chefs linked to the support received at the organizational or superior level. Supervisors' support can act as "passages," allowing employees to have more resources at home and work and feel less stress because of less conflict at home and work (Mansour & Tremblay, 2015). Supportive leadership employees will feel satisfied with their careers (Al-Sada et al., 2017). However, the influence of satisfaction in determining the direction of the relationship between causal factors

and burnout needs to be further investigated in the hotel kitchen environment by considering the influence of work culture.

5. Conclusion and Recommendation

This study has examined the relationship between role conflict, physical work environment, and supervisor support to job burnout. The findings of the study revealed that generally, the chef profession deals with various tasks; long working hours in shifts to meet expectations exposed them to job burnout. In the context of the physical environment in the workplace, Jongsik-Yu et al. (2020) reported that workers who work in environmentally friendly environments such as temperature, air quality, smell and decoration specially designed green places, space layout, and the existing natural environment that follow quality standards will minimize burnout rates among workers, in turn, help cure burnout. As a result, management must provide a pleasant physical work environment by considering employees' noise, temperature, lighting, and layout expectations. In addition to making work delegation regularly to avoid role conflict, management and superiors must revise the job scope to suit the position of each level in the kitchen brigade. Because employees are regarded as one of the company's most valuable assets, businesses must develop a work environment that promotes psychological well-being. Preventing burnout at work is a critical responsibility that managers must complete helping employees cope with the harmful effects of workplace stress. One method for achieving this goal is to have policies encouraging social support among employees and managers. Job burnout is a loss to the hotel industry, but it is not an impossible phenomenon to deal with, provided all parties involved must play a role.

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7. About Author

Arnieyantie Abdul Hadi is a lecturer at the Faculty of Hotel and Tourism Management, Universiti Teknologi MARA, Cawangan Pulau Pinang. She graduated with a Master of Science in Food Technology from Universiti Sains Malaysia. Her research interests are Food Safety and Occupational Safety and Health in the hospitality industry.

Dr. Ungku Fatimah Ungku Zainal Abidin graduated with a Ph.D. from Iowa State University, USA. Her main area of expertise is food service management, with sub-areas being food service management and food safety culture. She is currently serving as a lecturer at Universiti Putra Malaysia.

Associate Professor Dr. Norfezah Md Nor has completed her Ph.D. from Massey University, New Zealand. She is currently an Associate Professor at the Foodservice Department, Faculty of Hotel and Tourism Management, Universiti Teknologi MARA (UiTM), Cawangan Pulau Pinang, Malaysia. Her research interests are Food Safety & Hygiene, Food Quality & Consumer Behaviour, Occupational Safety & Health, Food Product Innovation & Sensory, and Hospitality Education.

Associate Professor Dr. Hazrina Ghazali graduated with a Ph.D. from Waikato University, New Zealand. She is currently serving as a lecturer at Universiti Putra Malaysia. The main area of expertise is food service management, with human resource and employee management sub-areas.

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