

**“BRIDGING THE KNOWLEDGE AND PUBLIC HEALTH
PRACTICE GAP: THE CASE OF HEALTH AND SAFETY
MANAGEMENT WITHIN HOSPITALITY INDUSTRY IN
LONDON”**

PILOT STUDY – LCDB7010

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1 INTRODUCTION

1.1 Background and Context: Health and Safety Practice in Hospitality

An essential component of operational procedures in the hospitality sector is health and safety management. Workers in restaurants, cafes, bars, and hotels are obliged to follow protocols on personal hygiene, temperature control, cleanliness, allergen management, and safe food handling. Regulatory frameworks, workplace training, and corporate rules that safeguard employees and the public all support these requirements.

However, hospitality work does not take place in controlled or predictable environments. Time constraints, staffing limitations, shifting consumer demand, and the requirement to maintain service efficiency all influence daily operations (Poulston, 2008). In these situations, health and safety protocols are implemented under operational pressure rather than just being followed as prescribed. As a result, there is a discrepancy between the theoretical and practical applications of safety.

Food safety and allergen management are particularly helpful areas to look at the issue in this larger framework. Both rely on the consistent application of procedural knowledge in real time, and both may be jeopardised when safety regulations conflict with operational demands. Because of this, the current study examines the broader knowledge-practice gap in hospitality health and safety by starting with behaviour linked to food safety.

1.2 The Problem: Why Knowledge Does Not Always Translate into Practice

The gap between knowledge and practice is a major problem that has emerged from current research. Employees may receive training, comprehend workplace expectations, and be aware of the proper processes, but they may not consistently implement this knowledge in actual work settings (da Cunha et al., 2014; Green et al., 2020). This calls into question the notion that compliance can be guaranteed just through knowledge.

The continued existence of this disparity implies that inadequate training is not the only problem. Rather, it shows how knowledge interacts with the environment in which work is done. Workers in hospitality environments frequently work under pressure, with safety priorities competing with speed, efficiency, and service delivery (Poulston, 2008; Teng et al., 2023). In

such circumstances, non-compliance may result from the practical challenge of regularly implementing processes in real time rather than ignorance.

In high-risk fields like allergy management, where procedural failure could have rapid and serious repercussions, this issue is especially crucial. However, the underlying behavioural problem is not limited to allergens. It addresses the more general issue of how operational practice in various hospitality settings incorporates health and safety knowledge.

1.3. Problematization: Reframing the Issue as a Knowledge–Practice Gap

The fact that this gap still exists suggests that hospitality research and practice frequently have a limited understanding of health and safety. Formal systems typically make the assumption that employees would behave safely if they are trained, observed, and provided with explicit procedures. But, mounting data indicates that opportunity, organisational context, and situational pressure all influence behaviour in addition to knowledge (Michie et al., 2011).

According to this viewpoint, safety issues are not isolated deviations from a system that is otherwise stable. Instead, they might be foreseeable results of settings where employees have to strike a compromise between operational demands and procedural requirements. By doing this, the emphasis is shifted from simply asking employees what they know to determining if their work environment allows them to regularly use that knowledge.

This study takes a more critical stance as a result. Instead of presuming that more knowledge will inevitably lead to better practice, it investigates whether working in the hospitality industry facilitates or hinders the continuous implementation of health and safety protocols.

1.4 Research Aim and Questions

This study aims to examine the gap between health and safety knowledge and practice within hospitality contexts, with particular focus on the organisational and contextual factors that influence whether knowledge is consistently applied in real working conditions.

To achieve this aim, the study addresses the following research questions:

RQ1: To what extent do hospitality workers demonstrate knowledge of health and safety procedures?

RQ2: To what extent is this knowledge translated into practice in everyday workplace settings?

RQ3: What organisational and contextual factors influence the application of health and safety procedures in hospitality environments?

RQ4: What barriers prevent the consistent enactment of health and safety practice?

The study uses an online survey of hospitality workers as part of a pilot design to look into these questions. The survey's main focus is on food safety-related practices, which provide a useful means of investigating more general health and safety practices in hospitality environments.

1.5 Contribution and Significance of the Study

This study contributes to the literature by advancing a more integrated understanding of health and safety practice in hospitality settings.

Specifically, the study looks at how operational variables shape the knowledge-practice gap rather than just recognising it. This is significant because it moves the emphasis from whether employees know what to do to whether their work settings allow them to perform it consistently.

From a practical perspective, the findings provide insights relevant to both hospitality management and policy development. By identifying the conditions under which compliance becomes difficult, the research supports the development of more realistic and context-sensitive interventions, moving beyond purely training-based approaches.

1.6 Scope and Limitations

This study focuses on those who work in the hospitality industry, particularly those who prepare and serve meals. Because it is a pilot study, the sample size is rather small ($n = 23$), which permits exploratory analysis but restricts the findings' generalisability.

Furthermore, the study depends on self-reported information gathered via an online survey, which could be skewed by responses. Because of perceived expectations or social desirability, participants may over-report compliance (Clayton and Griffith, 2002). Although these limitations are acknowledged, they also emphasise how crucial it is to look at the factors driving behaviour rather than depending only on reported behaviours.

1.7 Structure of the Study

To address the research problem, the following section critically reviews the existing literature on health and safety behaviour within hospitality settings, with particular emphasis on food safety practices as a measurable context. This provides the theoretical and empirical foundation for the study and supports the development of the analytical framework guiding the research.

2 LITERATURE REVIEW

2.1 Food Safety Knowledge and Practice: The Limits of Training

Despite the fact that this section mostly draws from the research on food safety, these studies are utilised to comprehend other general health and safety practices in hospitality settings (e.g. allergen management), because they have similar operational and behavioural traits.

Food safety research has traditionally been based on the assumption that better practice will result from increased knowledge. In order to improve awareness and technical comprehension of food hygiene practices, training programmes, certification systems and regulatory frameworks have been developed (Zanin et al., 2017; Soon et al., 2012). Although these methods have helped to increase baseline knowledge throughout the industry, there is growing debate over how effective they are at guaranteeing consistent behavioural compliance.

Food handlers frequently have sufficient knowledge of food safety concepts, but they do not consistently implement this information in practice, according to a large body of empirical research (da Cunha et al., 2014; Green et al., 2020). This pattern implies that while knowledge is important, it is not enough to ensure safe behaviour. The limitations of knowledge-based interventions are further reinforced by the persistence of foodborne illness despite extensive training and regulatory oversight.

Nevertheless, a large portion of this research continues to concentrate on assessing reported compliance and knowledge levels, frequently treating the link between the two as linear and predictable. This is a significant drawback, since it ignores

the complexity of actual workplaces where food safety procedures are implemented. Employees in hospitality situations may find it difficult to consistently apply their expertise due to time constraints, heavy workloads, and conflicting goals.

Training should therefore be viewed as necessary but not sufficient for ensuring consistent behavioural compliance. A more thorough strategy is needed, one that takes into account how environmental, organisational, and behavioural aspects affect the application of information in practice in addition to knowledge acquisition.

2.2 The Knowledge–Practice Gap: Evidence and Ongoing Limitations

One of the most frequently reported findings in food safety studies is the discrepancy between knowledge and practice. Research conducted in various contexts reveals that although knowledge levels are generally high, actual compliance varies greatly (Young et al., 2019; Bou-Mitri et al., 2018).

Early research by Clayton and Griffith (2002) revealed differences between the reported behaviours of food handlers and their beliefs, indicating that knowledge does not always translate into practice. This gap continues to exist in various circumstances, according to more recent studies. While Taha et al. (2020) discovered inconsistent hygiene procedures even among trained staff, Bailey et al. (2011) revealed failures in allergen management despite greater awareness. This is particularly significant, as allergen-related errors can have immediate and severe consequences, reinforcing the importance of consistent behavioural compliance. These results show that the knowledge-practice gap in food safety management is a systemic problem rather than a singular one.

The literature does a good job of identifying the gap, but it does a poor job of describing how and why it arises in real-world situations. Few studies look at the relationship between knowledge and actual working conditions whereas most studies focus primarily on measuring knowledge or compliance. This leaves a gap in our knowledge of how operational environments shape behaviour.

2.3 Behavioural Perspectives: Moving Beyond Rational Models

Behavioural theory is receiving more attention as a result of the limitations of knowledge-based explanations. According to conventional models like the Theory of Planned behaviour, attitudes, social norms, and perceived control all have an impact on behaviour (Ajzen, 1991). In the same way, learning, self-efficacy, and environmental factors are highlighted by Social cognitive theory (Bandura, 1986). While these frameworks extend beyond knowledge, these models assume that individuals

behave rationally when they possess the appropriate information and motivation. Given that decisions are sometimes made rapidly and under pressure in hospitality settings, this assumption might not accurately represent the realities of those contexts.

A more useful framework for comprehending behaviour is provided by more modern methods like the COM-B model. Capability, opportunity, and motivation interact to shape conduct, according to COM-B (Michie et al., 2011). This is especially important in situations involving food safety, because employees may possess the ability (knowledge) but are unable to put it into practice because of external factors like personnel shortages or time constraints.

This viewpoint is significant since it is consistent with new empirical trends. Employees may claim to be highly knowledgeable and self-assured, but they may still encounter circumstances that prevent them from consistently complying. This demonstrates that behaviour is influenced by both the environment in which knowledge is applied and knowledge itself.

2.4 Organisational Context: Culture, Pressure, and Everyday Practice

An important factor in determining food safety behaviour is the organisational environment. The idea of “food safety culture” emphasises how common norms, attitudes, and expectations affect how employees behave (Yiannas, 2009; Griffith et al., 2010). Prioritising safety increases the likelihood of compliance; as it interferes with operational demands, behaviour may change.

The significance of perceived company priorities is further emphasised by research on safety climate (Zohar, 2010). Workers react to what they perceive to be genuinely valued in practice in addition to written regulations. This often involves finding a balance between efficiency and service needs and safety in hospitality situations.

2.5 Policy and Regulation: Limits of Compliance-Based Approaches

Food safety systems rely heavily on regulation, inspection, and enforcement. While these mechanisms are essential for accountability, they may not fully address the behavioural drivers of compliance.

Conventional regulatory methods concentrate on observable results, such inspection findings, rather than the procedures that lead to those results. Consequently, they might not be able to depict the commonplace circumstances that impact

behaviour (Lunn and Lyons, 2022). During an examination, a workplace may seem compliant, yet it may be functioning under risky pressures.

More behaviourally informed methods are required, according to recent study. While Damschroder et al. (2009) stress the significance of context in influencing whether treatments are successfully adopted,

This demonstrates that effective food safety management requires a shift from purely compliance-based models towards approaches that consider behavioural, organisational, and contextual factors.

2.6 Synthesis and Research Gap

The literature demonstrates that while food safety knowledge among hospitality workers is generally adequate, behavioural compliance remains inconsistent. Research identifies a range of influencing factors, including organisational culture, time pressure, and workplace constraints, which shape behaviour in practice (da Cunha et al., 2014; Green et al., 2020).

This represents a key limitation, as it overlooks how workers adapt their behaviour by balancing safety requirements with operational pressures. In addition, much of the literature assumes that improving knowledge will lead to improved behaviour, without adequately accounting for operational constraints. This limits its explanatory power and highlights the need for more behaviourally informed analysis.

In response, this study adopts an integrated approach, examining knowledge, behaviour, and organisational conditions together to provide a more grounded understanding of how the knowledge–practice gap operates in hospitality environments.

2.7 Transition to Methodology

In response to these limitations, the following section outlines the methodological approach used to examine food safety knowledge and behaviour within hospitality settings. The study adopts a pilot design to explore how knowledge, organisational factors, and situational pressures interact in real working environments.

3 METHODOLOGY

3.1 Research Design and Approach

This study adopts a pilot research design to explore the gap between food safety knowledge and practice within hospitality environments. As identified in the preceding sections, the key issue is not whether knowledge exists, but whether it is consistently applied under real working conditions. This requires an approach that can capture both reported knowledge and the contextual factors influencing behaviour.

Given that the research problem is exploratory and context-dependent, a pilot study is acceptable in this situation. The goal is to find patterns, test hypotheses, and offer preliminary insights into how food safety behaviour functions in reality rather than striving for broadly applicable findings (Creswell and Clark, 2017). This is consistent with the study's goal of comprehending the circumstances in which knowledge is either limited or used.

Using both quantitative and qualitative components, the study takes a practical approach. This makes it possible for the study to assess reported behaviour and knowledge levels while also examining the situational and organisational elements that affect these results.

Importantly, the design of this study reflects the central research focus on the knowledge–practice gap. The study attempts to capture how knowledge is applied under actual working situations rather than looking at knowledge in isolation. This necessitates a strategy that takes into account both the organisational setting in which hospitality work is conducted and behavioural reactions.

3.2 Data Collection Method

Data were collected using an online survey administered via Google Forms, targeting individuals working in hospitality roles involving food preparation and service.

The use of a survey is appropriate for this study for two reasons. First, it enables the collection of structured data on food safety knowledge and self-reported practices across multiple participants. Surveys are widely used in food safety research

for this purpose (Zanin et al., 2017). Second, it allows participants to reflect on their experiences, including the conditions that affect their behaviour, which is central to understanding the knowledge–practice gap.

The questionnaire included closed-ended questions to assess knowledge and compliance, Likert-scale items to measure perceptions of workplace conditions, and open-ended questions to capture participant’s explanations of barriers and challenges

While the questionnaire focused primarily on food safety-related procedures, these measures were used as a practical indicator of wider health and safety behaviour within hospitality settings. Similar behavioural and operational elements can be found in practices like hygiene compliance, cross-contamination management, and allergen handling, especially in their emphasis on consistent procedural application under time constraints. Because of this, the study views food safety procedures as indicative of the larger knowledge-practice gap in health and safety, which is directly related to allergen management.

3.3 Sampling Strategy

The study employed a convenience sampling approach, targeting hospitality workers accessible to the researcher.

A total of 23 responses were collected. This sample size is appropriate for a pilot study, where the aim is exploratory analysis and the identification of initial patterns rather than statistical generalisation. The findings should therefore be interpreted as indicative rather than representative of the wider hospitality sector.

Importantly, the sample provides insight into real working conditions across different hospitality roles. Given that the study focuses on behaviour under pressure, capturing a range of experiences is more relevant than achieving statistical representation at this stage. However, it is acknowledged that convenience sampling may introduce bias, and the findings should therefore be interpreted as exploratory.

3.4 Operationalisation of Key Variables

To examine the knowledge–practice gap, key constructs were operationalised through specific survey measures.

Food Safety Knowledge was assessed using questions on hygiene procedures, including hand washing, allergen management, and general food handling practices.

Food Safety Behaviour was measured through self-reported compliance, including consistency of following procedures and behaviour under pressure. Organisational Factors were captured through Likert-scale items assessing time pressure, staffing levels, and management support.

Barriers to Compliance were explored through open-ended responses, allowing participants to describe challenges in their own words. These measures were designed to reflect both individual knowledge and contextual influences, aligning with the study's focus on behavioural and environmental factors. Questionnaire items were informed by existing food safety research to support content validity (Zanin et al., 2017).

The selection of food safety-related variables was intentional, as these practices provide a measurable and observable way of examining behavioural compliance in hospitality settings. Given that allergen management also depends on procedural accuracy, communication, and consistency, these variables are considered appropriate proxies for assessing wider health and safety behaviour.

3.5 Data Analysis

The data were analysed using a combination of descriptive statistics and thematic analysis. Quantitative data were analysed descriptively to identify patterns in levels of knowledge, reported compliance, and perceived workplace pressures. This approach is appropriate for a pilot study, where the objective is to identify trends rather than conduct complex statistical testing.

Qualitative responses were reviewed to identify common themes related to workplace pressures and barriers to compliance, which were used to support the interpretation of quantitative findings. This combination of methods allows the study to capture both what participants report and why they report it, which is essential for understanding the gap between knowledge and practice.

3.6 Ethical Considerations

Ethical principles were considered throughout the research process. Participation was voluntary, and respondents were informed of the purpose of the study prior to completing the survey.

All responses were collected anonymously, and no identifiable personal data were recorded. Participants were informed that their responses would be used solely for academic purposes and that they could withdraw at any time.

These measures ensure compliance with standard ethical requirements for social research, including informed consent and confidentiality (Creswell and Clark, 2017).

3.7 Limitations of the Methodology

As a pilot study, several methodological limitations should be acknowledged when interpreting the findings.

The use of self-reported data is a more serious limitation. Participants may be more likely to report behaviour that complies with expected standards than their regular actions due to the regulatory and ethical significance of food safety measures. This raises the potential for social desirability bias, in which answers represent idealised behaviour rather than real-world behaviour (Clayton and Griffith, 2002). This is especially relevant to the current study, which shows extremely high levels of reported compliance together with recognition of workplace pressures, indicating a possible discrepancy between perceived and actual behaviour.

Furthermore, using an online survey restricts the capacity to record behaviour in context. Although the survey generates information regarding participants' opinions and experiences, it does not permit close inspection of food handling procedures. Previous studies have shown that reported and observed behaviour frequently differ, suggesting that survey data by itself might not accurately represent real-world practice (Chapman et al., 2010).

Despite these limitations, the study provides valuable exploratory insight into the relationship between food safety knowledge, behaviour, and organisational context. The limitations identified do not undermine the relevance of the findings, but rather highlight the need for cautious interpretation and support the case for further research using larger samples and complementary methods such as observational studies.

3.8 Transition to Findings

The following section presents the findings of the study, focusing on food safety knowledge, reported practices, and the organisational factors influencing behaviour. These findings provide empirical insight into how the knowledge–practice gap manifests within real hospitality environments.

4. FINDINGS

4.1 Overview of Respondents

A total of 23 responses were collected from individuals working within the hospitality sector. Participants were involved in food preparation, handling, and service roles, providing insight into everyday food safety practices in operational environments.

As a pilot study, the findings are interpreted as indicative patterns rather than representative outcomes. However, they provide useful insight into how food safety knowledge and behaviour are experienced in practice.

4.2 Knowledge and Self-Reported Compliance

The findings indicate consistently high levels of self-reported safety knowledge and compliance among participants. A substantial majority of respondents (95.6%) reported that they always follow food safety procedures, while all participants (100%) indicated correct adherence to allergen management and hand hygiene practices. In addition, 86.9% of respondents expressed confidence in their ability to apply food safety knowledge in their daily work.

Mean scores further reinforce this pattern, with food safety compliance rated at 4.78 out of 5, allergen procedures at 4.95, and hand hygiene at a maximum score of 5.00. Confidence in food safety knowledge was also high, with a mean score of 4.48. Taken together, these results present an image of high knowledge and compliance; however, this interpretation becomes more complex when considered alongside operational pressures identified in subsequent sections.

4.3 Behaviour Under Operational Pressure

Despite the high levels of reported knowledge and compliance identified in the previous section, the findings also reveal the presence of operational pressures that may influence food safety behaviour in practice. A proportion of respondents acknowledged that workplace conditions can create challenges for maintaining consistent compliance. Specifically, 21.7% of participants agreed that time pressure makes it difficult to follow food safety procedures, while 26.0% indicated that staff shortages negatively affect safe practices. In addition, a smaller proportion (8.7%) reported that they sometimes skip procedures.

Mean scores for these items were comparatively lower, with skipping procedures rated at 1.47 out of 5, time pressure difficulty at 1.95, and staff shortages at 2.43. At face value, these scores suggest relatively low levels of non-compliance. However, their significance lies less in the frequency of reported behaviour and more in the acknowledgement that conditions exist which may compromise safe practice.

This distinction is important. While direct admission of non-compliance remains limited, a greater proportion of respondents recognise the presence of constraints that make adherence more difficult. This suggests that food safety behaviour is not solely determined by knowledge or intention, but is influenced by situational factors within the working environment. In particular, time pressure and staffing limitations appear to represent key barriers to the consistent application of procedures.

When considered alongside the high levels of reported compliance in Section 4.2, these findings reveal a clear tension within the data. On one hand, participants present themselves as consistently compliant; on the other, they acknowledge workplace conditions that may hinder such consistency. This indicates that self-reported compliance may not fully capture the complexity of behaviour in real operational conditions.

Therefore, rather than interpreting these results as evidence of low non-compliance, they are more appropriately understood as reflecting the constraints within which behaviour occurs. The findings suggest that even where knowledge and intention are present, the ability to consistently enact safe practices may be shaped—and at times limited—by the demands of the working environment.

4.4 Organisational Environment and Management Influence

The findings indicate that participants perceive a strong organisational commitment to food safety within their workplaces. A large majority of respondents agreed that management takes food safety seriously (95.6%), that food safety is prioritised even during busy periods (95.6%), and that practices are regularly monitored by supervisors (91.3%). Similarly, 91.3% of participants reported that food safety rules are strictly enforced.

Mean scores for these items were consistently high, with management commitment rated at 4.78 out of 5, prioritisation during busy periods at 4.91, monitoring at 4.73, and enforcement at 4.69. These results suggest that formal organisational structures and expectations around food safety are well established and clearly communicated.

However, these findings should be interpreted in the context of the operational pressures identified in the previous section. While respondents report strong managerial commitment and enforcement, they also acknowledge conditions—such as time pressure and staffing constraints—that can make compliance difficult. This suggests a potential gap between formal organisational expectations and the practical realities of everyday work.

This distinction highlights an important aspect of food safety behaviour. The presence of strong policies, monitoring, and enforcement mechanisms does not necessarily guarantee consistent adherence in practice. Instead, behaviour appears to be shaped not only by what organisations require, but by what employees are realistically able to achieve within the constraints of their working environment.

Furthermore, the uniformly high ratings of organisational support may also reflect perceived expectations or socially desirable responses, particularly in relation to management and enforcement. As with self-reported compliance, these responses may present an idealised view of organisational practice rather than capturing the full complexity of workplace dynamics.

Taken together, the findings suggest that while formal food safety systems and managerial expectations are in place, they operate within environments shaped by competing demands. This reinforces the idea that organisational commitment alone is insufficient to ensure consistent safe behaviour, and that greater attention must be given to how these expectations are supported under real operational conditions.

4.5 Emerging Pattern: Consistency and Tension in the Data

When the findings are considered collectively, the most significant pattern is not simply the high levels of reported knowledge and compliance, but the tension between these responses and participants' acknowledgement of operational pressures that make consistent adherence difficult. This contradiction represents the central empirical insight of the study.

On one hand, respondents consistently present themselves as knowledgeable, confident, and compliant with food safety procedures. On the other hand, they simultaneously recognise the presence of time pressure, staffing constraints, and situational demands that may limit their ability to maintain these standards in practice. This suggests that reported compliance does not fully reflect the complexity of behaviour in real working environments.

Rather than indicating the absence of non-compliance, this pattern points to the existence of a “hidden” knowledge–practice gap. In this context, non-compliance may not be explicitly reported, but is indirectly revealed through participants’ descriptions of the conditions under which they work. This aligns with previous research demonstrating discrepancies between self-reported and actual behaviour in food safety contexts (Clayton and Griffith, 2002; Chapman et al., 2010).

The findings therefore suggest that food safety behaviour is shaped by adaptive responses to competing demands, where workers navigate competing demands by balancing safety requirements with operational pressures. This interpretation is consistent with system-based perspectives of human performance, which emphasise how individuals adjust behaviour in response to environmental constraints (Rasmussen, 1997).

This has important implications for how compliance is understood. The data indicate that food safety behaviour cannot be fully captured through self-reported measures alone, as these may reflect idealised or expected behaviour rather than actual practice under pressure. Instead, behaviour appears to be contingent on situational factors, with workers operating within constraints that may lead to deviations from prescribed procedures, even when knowledge and intention are present.

Importantly, this tension highlights a limitation in conventional approaches to food safety management. If compliance is assessed primarily through reported behaviour or formal adherence to procedures, there is a risk that underlying inconsistencies remain unrecognised. This supports growing calls for more behaviourally informed approaches to food safety, which consider the interaction between individuals and their working environments (Lunn and Lyons, 2022).

Overall, this reinforces the central argument of the study: that food safety behaviour is not simply a function of knowledge, but a product of the interaction between individual capability and the conditions of the working environment. The apparent consistency in reported compliance should therefore be interpreted with caution, as it may mask a more complex and context-dependent reality of practice.

Qualitative responses also highlighted time pressure and staffing constraints as key challenges affecting the consistent application of procedures.

4.6 Summary of Findings

The findings indicate that, although participants report high levels of food safety knowledge and compliance, workplace pressures such as time constraints and staffing limitations may affect the consistent application of procedures. These results provide a basis for examining how knowledge, behaviour, and organisational context interact in practice.

5. DISCUSSION

5.1 Interpreting the Knowledge–Practice Gap

The findings reinforce the existence of a gap between food safety knowledge and its consistent application in practice. However, rather than indicating a lack of knowledge, the results suggest that this gap is shaped by the conditions under which work takes place.

Participants reported high levels of knowledge, confidence, and compliance, with mean scores close to the upper end of the scale. At face value, this would suggest that food safety practices are well understood and consistently followed. However, this interpretation becomes less straightforward when considered alongside the reported influence of time pressure and staffing constraints.

This contrast suggests that the issue is not a lack of knowledge, but the conditions under which that knowledge is applied. While participants may intend to follow correct procedures, the realities of hospitality work create situations in which consistent compliance becomes difficult. This aligns with previous research demonstrating that knowledge alone does not guarantee behavioural adherence (da Cunha et al., 2014; Green et al., 2020).

5.2 Explaining Behaviour Through the COM-B Framework

The findings can be more effectively understood through the COM-B model, which proposes that behaviour is shaped by the interaction of capability, opportunity, and motivation (Michie et al., 2011).

In this study, capability appears high, as reflected in participants' strong knowledge and confidence scores. However, the data suggest that opportunity is constrained, particularly in relation to time pressure and staffing levels. When workers report

that operational conditions make it difficult to follow procedures, this highlights a limitation in the opportunity to perform safe behaviour.

Motivation appears more complex. On one hand, respondents report strong organisational expectations and management support for food safety. On the other hand, the presence of operational pressures suggests that workers may be required to prioritise efficiency and service delivery in certain situations. This creates a tension between formal expectations and practical realities.

From a COM-B perspective, this imbalance explains why behaviour does not always align with knowledge. Even when capability and motivation are present, limited opportunity can prevent consistent compliance. This supports the argument that food safety behaviour must be understood as a product of system conditions rather than individual knowledge alone.

This finding challenges the implicit assumption within many food safety interventions that capability alone is sufficient. Instead, the results suggest that behaviour is constrained less by what workers know, and more by what the system allows them to do in practice.

5.3 The Role of Organisational Context

The findings also highlight the importance of organisational context in shaping behaviour. Participants reported strong management commitment, monitoring, and enforcement of food safety rules, suggesting that formal systems are in place.

However, the simultaneous presence of time pressure and staffing challenges indicates that formal structures do not fully determine behaviour. This reflects the distinction between formal policy and operational reality, where what is expected may differ from what is achievable in practice.

This aligns with research on safety climate, which suggests that employees respond not only to official rules but to perceived priorities within the organisation (Zohar, 2010). In hospitality settings, where speed and efficiency are critical, workers may adapt behaviour to meet operational demands, even when they are aware of safety requirements.

The findings therefore suggest that organisational commitment to food safety, while important, does not by itself ensure consistent behavioural compliance.

5.4 Hidden Gap

An important insight from the data is the limited direct admission of non-compliance. Only a small proportion of respondents reported skipping procedures, yet a larger proportion acknowledged conditions that make compliance difficult.

This suggests the presence of a “hidden knowledge–practice gap”, where non-compliance may not be openly reported but is indirectly indicated through descriptions of workplace pressures. This pattern is consistent with previous research showing discrepancies between self-reported and actual behaviour (Clayton and Griffith, 2002; Chapman et al., 2010).

The existence of this hidden gap has important implications. It indicates that relying solely on self-reported compliance may provide an incomplete picture of food safety practices. It also highlights the importance of examining contextual factors, as these may reveal underlying risks that are not immediately visible through direct questioning.

In this sense, the gap is not always directly observable, but embedded within the everyday compromises that workers make in response to operational demands.

5.5 Implications for Food Safety Management

The findings have several implications for both practice and policy.

First, they challenge the effectiveness of approaches that focus primarily on training. While training is essential for building knowledge, it does not address the conditions that influence behaviour. As demonstrated in this study, workers may already possess the required knowledge but still face barriers to consistent application.

Second, the results highlight the need for context-sensitive interventions. Improving food safety requires attention to staffing levels, workload management, and operational design. Without addressing these factors, compliance efforts may remain limited.

Third, the findings support the growing emphasis on behaviourally informed policy approaches. Rather than focusing solely on compliance outcomes, interventions should consider how behaviour is shaped within real environments (Lunn and Lyons, 2022; Lu and Wang, 2024).

5.6 Contribution to Existing Literature

This study contributes to the literature by providing empirical insight into how the knowledge–practice gap operates within hospitality settings. While previous research has identified the gap, this study highlights the role of operational pressures and organisational conditions in shaping behaviour.

By applying a behavioural framework, the findings extend existing work by demonstrating that food safety behaviour cannot be explained by knowledge alone. Instead, it must be understood as the result of interacting factors, including capability, opportunity, and motivation.

This supports a shift towards more integrated models of food safety management, where behaviour is examined within its broader context rather than in isolation.

5.7 Extending the Findings to Allergen Management

Although the empirical findings are based on food safety-related practices, the behavioural patterns identified have direct relevance to allergen management. Both areas depend on the accurate and consistent application of procedural knowledge under time pressure and operational constraints. The presence of a knowledge–practice gap in general health and safety behaviour suggests that similar challenges are likely to exist in allergen-related practices, where the consequences of error may be more immediate and severe.

As the research develops, there is a clear need to deepen the focus on allergen management as a specific area of investigation. Future research could explore how communication, staff training, and operational pressures influence allergen-related decision-making in real time. By extending the current findings into this area, the study can contribute to a more targeted understanding of risk within hospitality health and safety practice.

6. CONCLUSION

6.1 Summary of Findings

This study examined the gap between food safety knowledge and its application in hospitality settings. The findings indicate that while knowledge and reported compliance are high, consistent practice is influenced by operational conditions, particularly time pressure and staffing constraints.

Participants also identified operational pressures, particularly time constraints and staffing limitations, which affect their ability to apply food safety procedures consistently. This indicates that the knowledge–practice gap is not simply a result of insufficient training, but a reflection of the conditions in which behaviour occurs.

The study therefore demonstrates that food safety should be understood as a behavioural and contextual issue rather than solely a technical or regulatory one. Behaviour is shaped not only by what workers know, but by what they are able to do within real working environments.

Addressing this gap requires a shift in focus—from increasing knowledge to improving the conditions that support consistent safe practice. Without this shift, efforts to improve food safety are likely to have only limited impact in practice.

6.2 Theoretical Implications

This study contributes to the literature by providing a more context-sensitive understanding of the knowledge–practice gap. Rather than viewing behaviour as a direct outcome of knowledge, the findings demonstrate how behavioural outcomes are shaped by the interaction between capability and opportunity within real working environments.

A key contribution is the identification of a “hidden knowledge–practice gap”. Although participants reported high levels of compliance, they also described workplace pressures—such as time constraints and staffing issues—that can make consistent adherence difficult. This suggests that self-reported compliance may reflect expected behaviour rather than actual practice, highlighting the limitations of relying on reported data alone.

The study also applies the COM-B framework (Michie et al., 2011) to show that while capability (knowledge) is high, opportunity is often constrained. This helps explain why behaviour does not always align with knowledge in real working environments.

Overall, the study shifts the focus from what workers know to the conditions under which they are expected to apply that knowledge, offering a more realistic and context-based understanding of food safety behaviour.

6.3 Practical Implications

The findings suggest that current food safety approaches, which focus mainly on training and compliance, may not be sufficient. This highlights the need for a more realistic approach to food safety management. Rather than focusing only on training, organisations should consider how workplace conditions—such as staffing levels, workload, and time pressure—affect behaviour in practice.

For managers, this means creating environments where safe practices are achievable, not just expected. For policymakers, it suggests that compliance systems should take into account the conditions under which behaviour occurs, rather than relying only on reported or observed adherence.

Overall, improving food safety requires a shift in focus—from increasing knowledge to improving the conditions that support consistent safe behaviour.

6.4 Limitations and Future Research

As a pilot study, the research has several limitations. The relatively small sample size ($n = 23$) limits the generalisability of findings, and the use of self-reported data introduces the potential for response bias (Clayton and Griffith, 2002). Furthermore, the study does not include direct observation of behaviour, which may provide a more accurate representation of practice.

Future research should build on these findings by using larger samples and incorporating observational methods to examine how food safety behaviour is enacted in real time. In addition, further studies could explore the interaction between organisational factors and behavioural outcomes in greater depth, potentially using more advanced analytical techniques.

7. REFLECTIVE ACCOUNT

7.1 Introduction

This reflective account critically evaluates the process of conducting the pilot study on the knowledge–practice gap in health and safety within the hospitality sector. It specifically focus on health and safety as a measurable context. Reflection is a

key component of postgraduate and doctoral-level research, as it enables the researcher to move beyond description and engage in critical evaluation of decisions, assumptions, and learning throughout the research process (Creswell and Clark, 2017).

The purpose of this reflection is to examine how the study developed from initial conceptualisation to final interpretation, to identify methodological and practical challenges encountered, and to evaluate the insights gained. While doing it, the reflection not only considers what was done, but also answer why certain decisions were made and how they shaped the overall research outcome.

7.2 From Topic to Problem: Developing a Critical Focus

At the initial stage of the research, the focus was broadly centred on health and safety practices within the hospitality sector. However, early engagement with the literature revealed that the issue was not simply one of importance, but of inconsistency. The health and safety procedures, especially in areas such as food safety and allergen management are highly regulated and widely taught even though failures in practice continue to occur.

This realisation led to a significant shift in the conceptualisation of the study. Rather than treating health and safety as a general topic, the research began to focus on a specific problem: the gap between knowledge and practice. This process of problematisation was critical, as it moved the study from a descriptive approach towards a more analytical and theoretically informed investigation (Alvesson and Sandberg, 2011).

The identification of the knowledge–practice gap provided a clear direction for the research. Instead of asking whether workers possess knowledge, the study explored why that knowledge is not always consistently applied in real working environments. This shift in focus was one of the most important developments in the research process, as it shaped both the literature review and the methodological design.

7.3 Designing the Study: Translating Theory into Method

The design of the study required translating an abstract research problem into a practical method of investigation. The decision to use an online survey was influenced by both contextual and methodological considerations.

From a practical perspective, hospitality workers have irregular schedules, high workloads, and limited availability which made traditional face-to-face data collection challenging. The use of Google Forms provided a flexible and accessible

means of data collection, allowing participants to respond at their convenience. This was particularly important given the time constraints associated with the study. Also responses were anonymous as well

From a methodological perspective, the survey allowed for the collection of both quantitative and qualitative data. Quantitative measures enabled the assessment of knowledge levels and self-reported compliance, while qualitative responses provided insight into the contextual factors influencing behaviour. This aligns with a pragmatic research approach, which prioritises the use of methods that best address the research problem (Creswell and Clark, 2017).

However, during the design process, a key challenge emerged: the difficulty of measuring behaviour. While knowledge can be assessed through structured questions, behaviour is more complex and context-dependent. This led to the inclusion of questions relating to workplace conditions, such as time pressure and staffing levels. In retrospect, this was a critical decision, as it allowed the study to move beyond measuring knowledge alone and begin to capture the conditions under which behaviour occurs.

7.4 Data Collection: Practical Constraints and Research Realities

The data collection stage highlighted the gap between research design and real-world feasibility. Although the survey was relatively straightforward to distribute, obtaining responses proved more difficult than anticipated. Hospitality workers often have limited time and may not prioritise participation in academic research, which resulted in a relatively small sample size ($n = 23$).

This experience provided an important insight into the realities of applied research. While larger sample sizes are often desirable, practical constraints can limit what is achievable, particularly within the timeframe of a pilot study. Rather than viewing this solely as a limitation, it reinforced the importance of positioning the study as exploratory and acknowledging the constraints under which the research was conducted.

Another significant issue relates to the nature of self-reported data. The findings indicated very high levels of reported compliance, which initially appeared to suggest that food safety practices were being consistently followed. However, when these responses were considered alongside participants' acknowledgement of time pressure and staffing constraints, it became clear that the data required careful interpretation.

This raised critical questions about response bias, particularly social desirability bias, where participants may report behaviour that aligns with expected standards rather than actual practice (Clayton and Griffith, 2002). This realisation was important, as it highlighted the limitations of relying solely on self-reported measures and reinforced the need for a more critical approach to data interpretation.

7.5 Interpreting the Findings: Recognising the Hidden Gap

The analysis of the data provided one of the most significant learning points in the research process. At first, the high levels of reported knowledge and compliance appeared to contradict the existing literature, which consistently identifies a gap between knowledge and practice.

However, further reflection revealed that this apparent contradiction was not necessarily indicative of genuine compliance. Instead, the data suggested the presence of a “hidden knowledge–practice gap”. While participants reported high compliance, they also acknowledged the presence of workplace pressures that could hinder their ability to consistently follow procedures.

This insight was particularly important, as it demonstrated that the gap may not always be directly observable through self-reported data. Rather, it may be embedded within the conditions under which work takes place, where individuals adapt their behaviour in response to operational demands. This interpretation is consistent with previous research highlighting discrepancies between reported and observed behaviour in food safety contexts (Chapman et al., 2010).

This stage of the research emphasised the importance of critical interpretation. It showed that data cannot always be taken at face value and must be understood within its broader context. This represents a key aspect of doctoral-level research, where the emphasis is not only on data collection, but on the ability to interpret findings in a meaningful and theoretically informed way.

7.6 Linking Theory and Empirical Data

The application of behavioural theory played a crucial role in making sense of the findings. The COM-B model (Michie et al., 2011) provided a useful framework for understanding the interaction between knowledge, behaviour, and context.

Through this lens, it became clear that while capability (knowledge) was high, opportunity (workplace conditions) was often constrained. Participants’ responses relating to time pressure and staffing limitations indicated that the opportunity to

perform safe behaviour was not always present. Motivation appeared to be influenced by competing priorities, particularly the need to balance safety with efficiency and service delivery.

The use of this framework allowed the findings to be interpreted in a more structured and theoretically grounded way. It also highlighted the importance of selecting appropriate theoretical models that align with the research problem, rather than applying theory superficially.

This process reinforced the value of integrating theory and data. Rather than treating theory as a separate component, it became a tool for explaining real-world behaviour. This represents an important learning outcome, as it demonstrates how theoretical frameworks can enhance the depth and credibility of empirical research.

7.7 What I Would Do Differently

Reflecting on the research process, several areas for improvement can be identified.

First, a larger and more diverse sample would strengthen the robustness of the findings. Future research could aim to include participants from a wider range of hospitality settings, potentially using multiple recruitment strategies to increase participation.

Second, incorporating observational methods would provide a more accurate representation of behaviour in practice. As identified in the literature, there is often a discrepancy between reported and observed behaviour, and reliance on self-reported data limits the depth of insight that can be achieved (Clayton and Griffith, 2002; Chapman et al., 2010).

Third, the questionnaire could be refined to include more detailed measures of organisational factors, such as workflow design, management practices, and communication processes. This would allow for a deeper exploration of the conditions influencing behaviour.

Finally, additional time for data collection would improve the overall quality of the study. Time constraints influenced both the sample size and the depth of analysis, highlighting the importance of realistic planning in research design.

7.8 Conclusion of Reflection

Overall, this research process has provided valuable insight into both the subject of health and safety in hospitality and the nature of conducting applied research. The study demonstrated that the knowledge–practice gap is not simply a matter of insufficient knowledge, but a complex issue shaped by behavioural and organisational factors.

From a research perspective, the project reinforced the importance of critical thinking, methodological flexibility, and careful interpretation of data. It also highlighted the challenges associated with working with real-world participants and the limitations of self-reported data.

Most importantly, the study emphasised the need to connect theory, data, and practice. By doing so, it provided a more grounded and realistic understanding of how health and safety behaviour operates within hospitality environments, and established a foundation for more rigorous and context-sensitive future research in this area.

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9 APPENDIXES

9.1 Appendix a – questionnaire used in google form

Food Safety Knowledge and Practice in Hospitality: Pilot Survey

Participant Information

This survey is part of a pilot study exploring food safety knowledge and practice in hospitality settings. It is for academic research only. Your responses are anonymous and confidential. You may stop at any time. The survey should take about 5–7 minutes.

** Indicates required question*

Section 1: Background Information

1. What is your current role? *

Mark only one oval.

- ☐ Chef
- ☐ Kitchen assistant
- ☐ Food runner/ commis
- ☐ Waiter/waitress
- ☐ Supervisor/manager
- ☐ Other

2. What type of hospitality business do you work in? *

Mark only one oval.

- ☐ Restaurant

- ☐ Café
- ☐ Pub/bar
- ☐ Hotel
- ☐ Fast food/takeaway
- ☐ Catering
- ☐ Other

3. How many years have you worked in hospitality? *

Mark only one oval.

- ☐ Less than 1 year
- ☐ 1–3 years
- ☐ 4–6 years
- ☐ 7–10 years
- ☐ More than 10 years

4. Have you received formal food safety training? *

Mark only one oval.

- ☐ Yes
- ☐ No
- ☐ Not sure

5. How recently did you complete food safety training? *

Mark only one oval.

- ☐ Within the last 6 months
- ☐ Within the last year
- ☐ More than 1 year ago

- ☐ Never
- ☐ Not sure

Section 2: Food Safety Knowledge

6. What is the safest temperature range for a refrigerator? *

Mark only one oval.

- ☐ 0°C to 5°C
- ☐ 6°C to 10°C
- ☐ 10°C to 15°C
- ☐ Not sure

7. Can shared utensils cause cross-contamination? *

Mark only one oval.

- ☐ Yes
- ☐ No
- ☐ Not sure

8. Can cooking always remove the risk from food allergens? *

Mark only one oval.

- ☐ Yes
- ☐ No
- ☐ Not sure

9. When should food handlers wash their hands? *

Tick all that apply.

- ☐ Before handling food
- ☐ After using the toilet
- ☐ After touching raw food
- ☐ After handling rubbish
- ☐ Only when hands look dirty

10. Which of the following is most important when a customer reports a food allergy? *

Mark only one oval.

- ☐ Serve quickly
- ☐ Ignore if the allergy seems minor
- ☐ Follow the allergy procedure carefully
- ☐ Ask another staff member to decide

Section 3: Self-Reported Practice

Use a scale from 1 to 5:

1 = Strongly disagree

5 = Strongly agree

11. I always follow food safety procedures during my shift. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

12. I always follow allergen procedures correctly when serving customers. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

13. I wash my hands at all required times during work. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

14. I can apply my food safety training easily in real work situations. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

15. I sometimes skip food safety procedures when under pressure. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

Section 4: Organisational and Workplace Factors

Use a scale from 1 to 5:

1 = Strongly disagree

5 = Strongly agree

16. Time pressure makes it difficult to follow food safety procedures. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

17. I feel confident applying food safety knowledge at work. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

18. Staff shortages affect safe food handling in my workplace. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

19. Management takes food safety seriously. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

20. Food safety is prioritised even during busy periods. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

21. Supervisors regularly monitor food safety practices. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

22. Food safety rules are strictly enforced in my workplace. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

23. The training I received reflects real kitchen or service conditions. *

Mark only one oval.

Strongly disagree 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ Strongly agree

Section 5: Open-Ended Questions

24. In your opinion, what makes it difficult to follow food safety procedures consistently?

25.What would help staff follow food safety procedures more effectively?

Thank you for taking part in this study. Your responses are greatly appreciated.

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9.2 Appendix b – survey responses

Food Safety & Allergen Awareness in Hospitality – Survey Responses

Total Respondents: 23

Section A — Background information (Questions 1–5)

#	Timestamp	Q1. Current Role	Q2. Type of Business	Q3. Years in Hospitality	Q4. Formal Food Safety Training	Q5. Most Recent Training
1	2026/04/17 12:51:38 pm CET	Waiter/waitress	Restaurant	1–3 years	Yes	Within the last year
2	2026/04/17 12:56:53 pm CET	Waiter/waitress	Restaurant	1–3 years	Yes	Within the last 6 months
3	2026/04/17 1:17:55 pm CET	Waiter/waitress	Restaurant	7–10 years	Yes	Within the last 6 months
4	2026/04/17 1:33:16 pm CET	Waiter/waitress	Restaurant	7–10 years	Yes	Within the last 6 months

#	Timestamp	Q1. Current Role	Q2. Type of Business	Q3. Years in Hospitality	Q4. Formal Food Safety Training	Q5. Most Recent Training
5	2026/04/17 1:50:45 pm CET	Chef	Hotel	1–3 years	Yes	Within the last year
6	2026/04/17 1:55:52 pm CET	Supervisor/manager	Restaurant	More than 10 years	Yes	Within the last 6 months
7	2026/04/17 2:15:56 pm CET	Chef	Restaurant	7–10 years	Yes	Within the last 6 months
8	2026/04/17 2:21:30 pm CET	Food runner/commis	Restaurant	1–3 years	Yes	Within the last 6 months
9	2026/04/17 2:30:40 pm CET	Supervisor/manager	Restaurant	1–3 years	Yes	Within the last 6 months
10	2026/04/17 2:40:13 pm CET	Waiter/waitress	Restaurant	4–6 years	Yes	Within the last year
11	2026/04/17 2:45:46 pm CET	Waiter/waitress	Restaurant	4–6 years	Yes	Within the last 6 months
12	2026/04/17 2:57:48 pm CET	Chef	Restaurant	1–3 years	Yes	Within the last 6 months
13	2026/04/17 3:44:38 pm CET	Chef	Restaurant	1–3 years	Yes	More than 1 year ago
14	2026/04/17 5:22:45 pm CET	Chef	Restaurant	4–6 years	Yes	Within the last year
15	2026/04/17 6:12:02 pm CET	Other	Restaurant	1–3 years	Yes	Within the last 6 months

#	Timestamp	Q1. Current Role	Q2. Type of Business	Q3. Years in Hospitality	Q4. Formal Food Safety Training	Q5. Most Recent Training
16	2026/04/17 6:17:30 pm CET	Waiter/waitress	Restaurant	7–10 years	Yes	Within the last 6 months
17	2026/04/17 11:03:07 pm CET	Supervisor/manager	Restaurant	More than 10 years	Yes	Within the last year
18	2026/04/17 11:24:42 pm CET	Supervisor/manager	Restaurant	4–6 years	Yes	Within the last year
19	2026/04/17 11:49:44 pm CET	Chef	Restaurant	Less than 1 year	Yes	Within the last 6 months
20	2026/04/17 11:49:44 pm CET	Chef	Restaurant	1–3 years	Yes	Within the last 6 months
21	2026/04/18 12:04:23 am CET	Waiter/waitress	Restaurant	Less than 1 year	Yes	Within the last year
22	2026/04/18 1:34:13 am CET	Waiter/waitress	Restaurant	More than 10 years	Yes	Not sure
23	2026/04/20 1:58:49 am CET	Other	Restaurant	4–6 years	Yes	Within the last 6 months

Section B — Food Safety Knowledge (Questions 6–10)

#	Q6. Safest Fridge Temp	Q7. Shared Utensils – Cross-Contamination?	Q8. Cooking Removes Allergen Risk?	Q9. When to Wash Hands	Q10. Most Important Action for a Reported Allergy
1	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
2	6°C to 10°C	No	Not sure	Before handling food	Follow the allergy procedure carefully
3	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish; Only when hands look dirty	Follow the allergy procedure carefully
4	6°C to 10°C	Yes	No	Before handling food	Follow the allergy procedure carefully
5	0°C to 5°C	Yes	Yes	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
6	0°C to 5°C	No	No	Before handling food	Follow the allergy procedure carefully
7	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
8	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
9	0°C to 5°C	Yes	No	Before handling food	Follow the allergy procedure carefully
10	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
11	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
12	6°C to 10°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully

#	Q6. Safest Fridge Temp	Q7. Shared Utensils – Cross-Contamination?	Q8. Cooking Removes Allergen Risk?	Q9. When to Wash Hands	Q10. Most Important Action for a Reported Allergy
13	0°C to 5°C	Yes	No	Before handling food	Follow the allergy procedure carefully
14	0°C to 5°C	Not sure	Not sure	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
15	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
16	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
17	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
18	Not sure	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish; Only when hands look dirty	Follow the allergy procedure carefully
19	0°C to 5°C	No	No	Before handling food	Follow the allergy procedure carefully
20	0°C to 5°C	Yes	Yes	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
21	6°C to 10°C	No	Yes	Before handling food; After using the toilet; After handling rubbish	Follow the allergy procedure carefully
22	0°C to 5°C	Yes	No	Before handling food; After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully
23	6°C to 10°C	Yes	Yes	After using the toilet; After touching raw food; After handling rubbish	Follow the allergy procedure carefully

Section C — Attitudes & Behaviours (Questions 11–23, Likert 1–5)

Scale: 1 = Strongly Disagree 2 = Disagree 3 = Neutral 4 = Agree 5 = Strongly Agree

Question Key: Q11 Follow food safety procedures during shift • Q12 Follow allergen procedures correctly • Q13 Wash hands at all required times • Q14 Apply training easily in real situations • Q15 Sometimes skip procedures under pressure • Q16 Time pressure makes it difficult • Q17 Confident applying knowledge at work • Q18 Staff shortages affect safe handling • Q19 Management takes food safety seriously • Q20 Food safety prioritised during busy periods • Q21 Supervisors regularly monitor practices • Q22 Food safety rules strictly enforced • Q23 Training reflects real conditions

#	Q11	Q12	Q13	Q14	Q15	Q16	Q17	Q18	Q19	Q20	Q21	Q22	Q23
1	5	5	5	5	1	1	5	1	5	5	5	5	5
2	5	5	5	5	1	1	3	1	5	5	5	5	3
3	5	5	5	5	1	1	5	4	5	5	5	5	5
4	5	5	5	5	1	3	5	3	5	5	5	2	4
5	5	5	5	5	3	4	4	5	5	3	2	5	5
6	5	5	5	5	1	1	5	1	5	5	5	5	5
7	5	5	5	5	1	1	5	3	5	5	5	5	5
8	5	5	5	5	1	4	5	2	5	5	5	5	5
9	5	5	5	5	1	1	5	1	5	5	5	5	5
10	5	5	5	5	1	1	5	1	5	5	5	5	5
11	5	5	5	5	1	1	5	1	5	5	5	5	5
12	5	5	5	5	1	1	5	3	2	5	3	3	3
13	5	5	5	5	2	3	5	3	5	5	5	5	5

#	Q11	Q12	Q13	Q14	Q15	Q16	Q17	Q18	Q19	Q20	Q21	Q22	Q23
14	5	5	5	5	1	1	5	1	5	5	5	5	5
15	5	5	5	5	1	4	1	2	4	5	5	5	5
16	5	5	5	5	1	4	1	2	4	5	5	5	5
17	5	5	5	5	1	1	5	1	5	5	5	5	5
18	5	5	5	3	1	1	5	1	5	5	5	5	5
19	4	5	5	4	1	1	4	4	5	5	5	5	5
20	5	5	5	5	1	1	5	5	5	5	5	5	5
21	1	4	5	5	5	5	5	5	5	5	4	4	4
22	5	5	5	5	1	1	5	1	5	5	5	4	5
23	5	5	5	1	5	3	5	5	5	5	5	5	5

Section D — Open-Ended Responses (Questions 24–25)

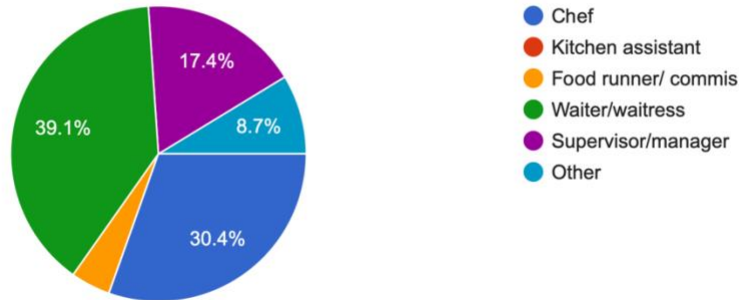
#	Q24. What makes it difficult to follow food safety procedures consistently?	Q25. What would help staff follow food safety procedures more effectively?
1	When everybody is not doing their roles properly when comes with food handling is the riskiest to maintain food safety's	Under strict management rules
2		
3	Human Error and Habits: It is easy to forget simple steps, like washing hands or switching cutting boards, especially during high-stress or busy shifts. Time Constraints: In fast-paced kitchen environments, staff may feel pressured to cut corners to keep up with orders, prioritizing speed over strict safety protocols. Lack of Training or Resources: Without regular refresher training or the proper tools (e.g., enough thermometers or color-coded equipment), maintaining high standards becomes much harder.	Comprehensive and Regular Training: Move beyond a one-time induction. Use engaging, ongoing training and refresher courses to ensure staff understand not just what to do, but why it is vital for safety. Leading by Example: Management must consistently model the correct behaviors, such as frequent handwashing and wearing proper PPE. When leadership prioritizes safety, staff are more likely to follow suit. Visual Aids and Reminders: Place clear, simple posters and signs in key areas (e.g., near sinks or prep stations) to provide instant reminders of protocols during busy shifts.
4	If is not checked properly	More training
5	Work pressure and rush	
6	Only when is really busy but it shouldn't happened	Just keep practicing at all time
7		
8	Busy peak hours working	Reminding them safety procedures sometimes during the morning briefings
9	Time pressure during busy periods, staff shortages, and lack of clear communication can make it harder to follow procedures consistently. Sometimes inadequate training or unclear instructions can also lead to mistakes.	Better training, regular reminders, and clear procedures would help. Having enough staff on shift, supportive management, and proper supervision also make it easier to follow food safety rules consistently.
10	Lack of training or food safety knowledge, Poor communication	Proper training, Good supervision and management support like clear procedures and simple instructions.
11	Sometimes in a busy day	Good workplace setup would be helpful

#	Q24. What makes it difficult to follow food safety procedures consistently?	Q25. What would help staff follow food safety procedures more effectively?
12	Management abilities loss	Patient and optimistic but disciplined
13	Habit and routine	Self Awareness
14	It is from every chef's protocol. Can't be difficult.	Keep reminding
15	Lack of knowledge and understanding	A good and supportive management team
16	Lack of understanding and situation	Training them well and communication skills
17		
18	Teamwork	Followup on regular basis
19	Nothing	Rules and training precisely.
20	Environmental factors, for example hot weather	Operational procedures
21	Food knowledge	Learning continues and developing the knowledge
22	Lack of knowledge	Being aware that it is a matter of health and not preference.
23	Follow food safety protocols	Proper training

9.3 Appendix c - Data analysis

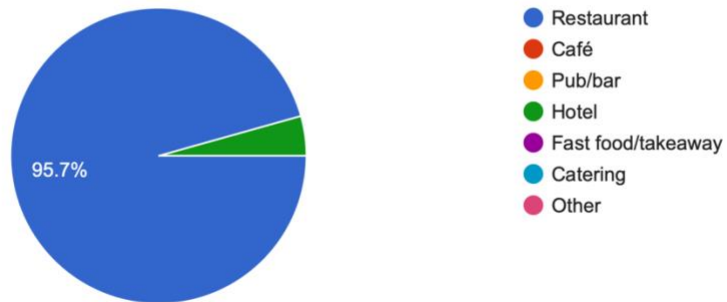
1. What is your current role?

23 responses



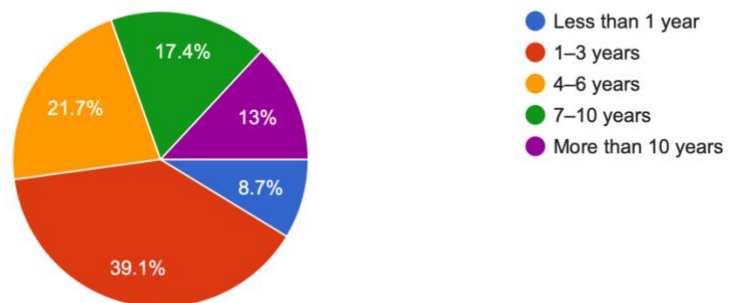
2. What type of hospitality business do you work in?

23 responses



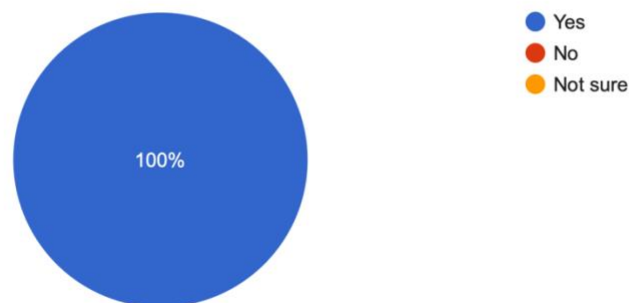
3. How many years have you worked in hospitality?

23 responses



4. Have you received formal food safety training?

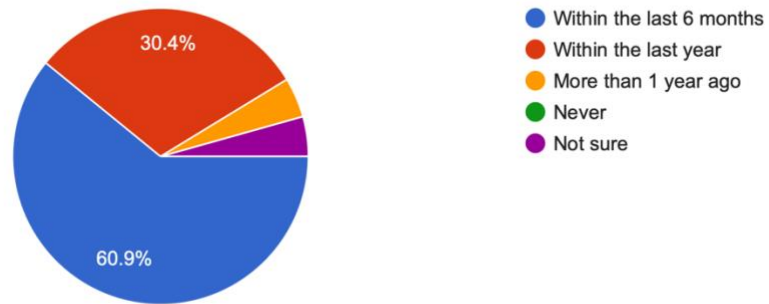
23 responses



All participants received formal food training

5. How recently did you complete food safety training?

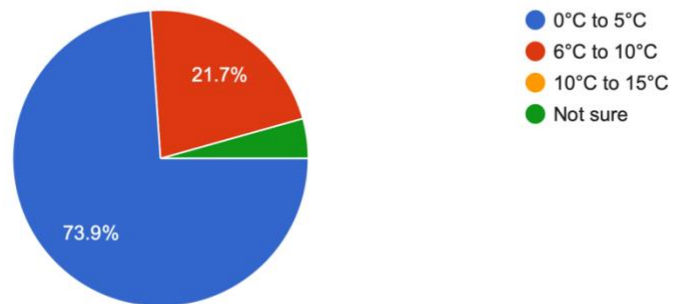
23 responses



Most completed training within last year, indicating relatively up to date knowledge.

6. What is the safest temperature range for a refrigerator?

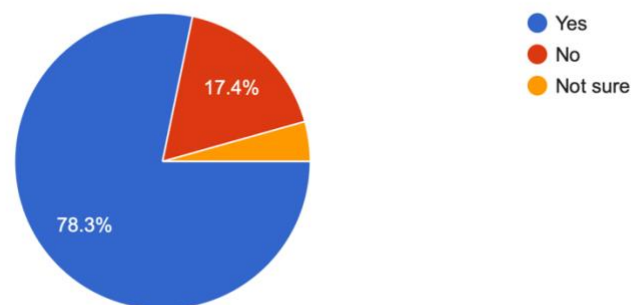
23 responses



Majority knows the correct answer

7. Can shared utensils cause cross-contamination?

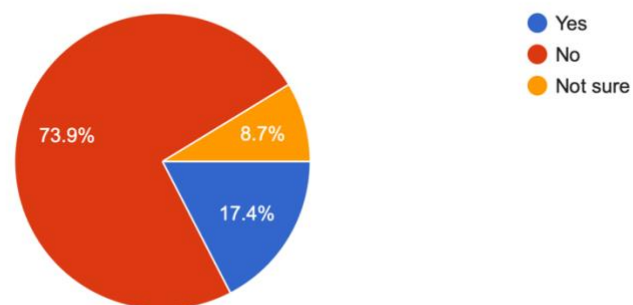
23 responses



Majority did correct answer showing strong awareness of contamination risks

8. Can cooking always remove the risk from food allergens?

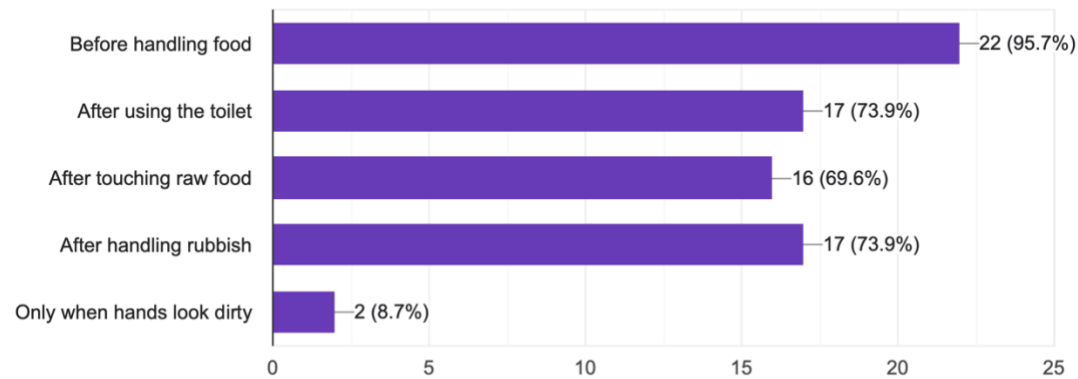
23 responses



Most of them had good knowledge eventhough minority cant be ignored, showing misunderstanding

9. When should food handlers wash their hands?

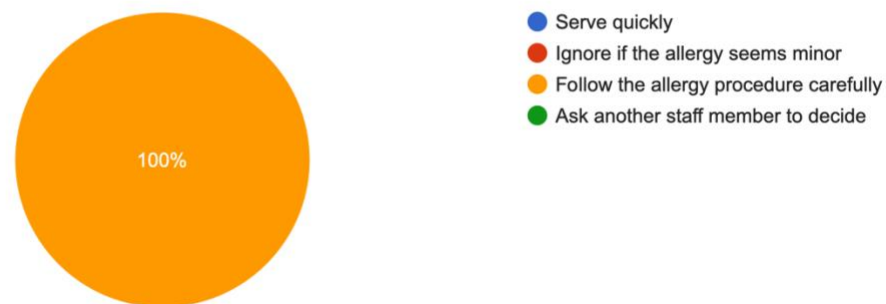
23 responses



Most correctly identified key situations, but incorrect options indicating strong hygiene awareness

10. Which of the following is most important when a customer reports a food allergy?

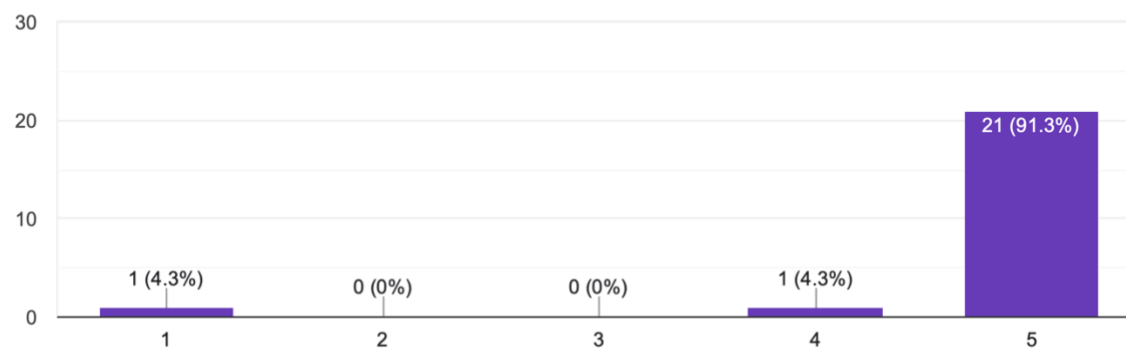
23 responses



Shows theoretical understanding of allergen management priorities

11. I always follow food safety procedures during my shift.

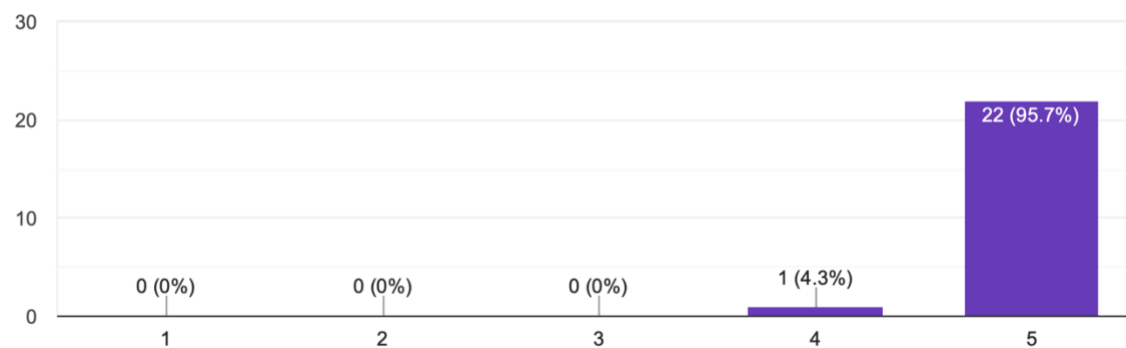
23 responses



This may reflect ideal behaviour rather than actual constituent practice

12. I always follow allergen procedures correctly when serving customers.

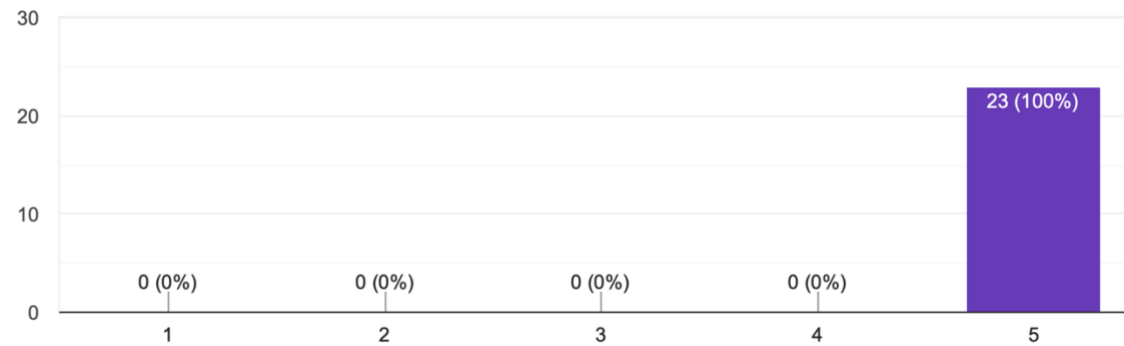
23 responses



Contrasts with knowledge gaps identified earlier

13. I wash my hands at all required times during work.

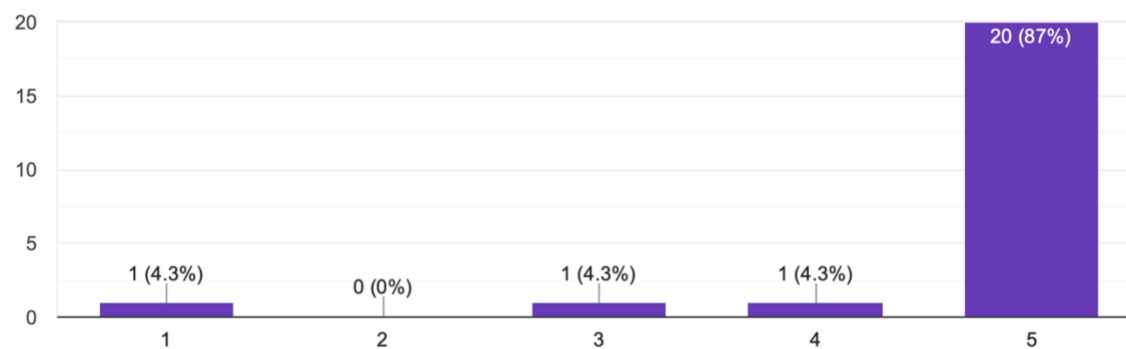
23 responses



This may indicate possible over reporting due to social desirability bias

14. I can apply my food safety training easily in real work situations.

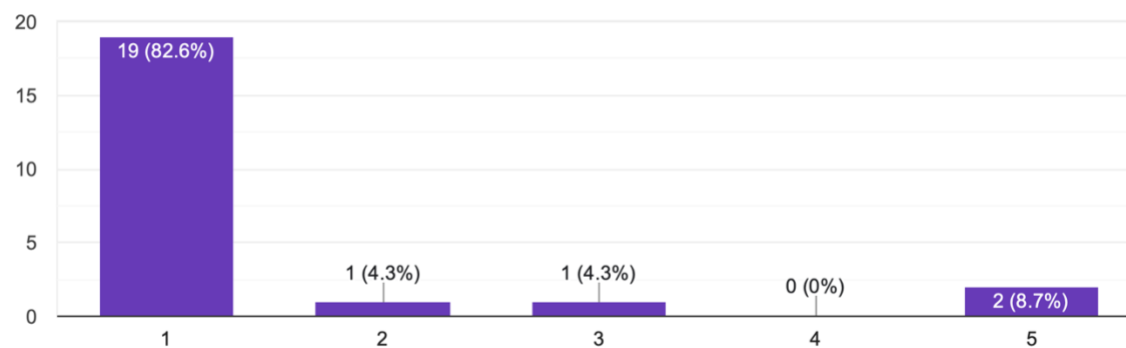
23 responses



Eventhough it is minoriry people genuinely speaking difficulty in transalating knowledge into action

15. I sometimes skip food safety procedures when under pressure.

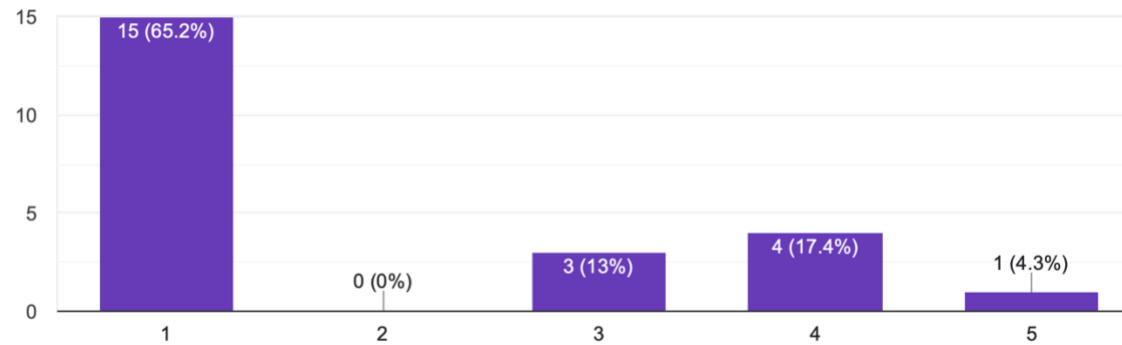
23 responses



This highlights a clear gap between knowledge and actual behaviour

16. Time pressure makes it difficult to follow food safety procedures.

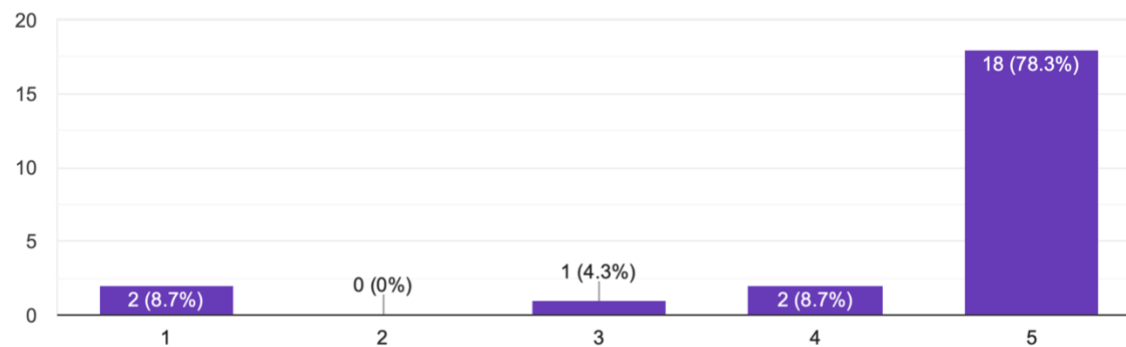
23 responses



This confirms that operational demands interfere with safe practices.

17.I feel confident applying food safety knowledge at work.

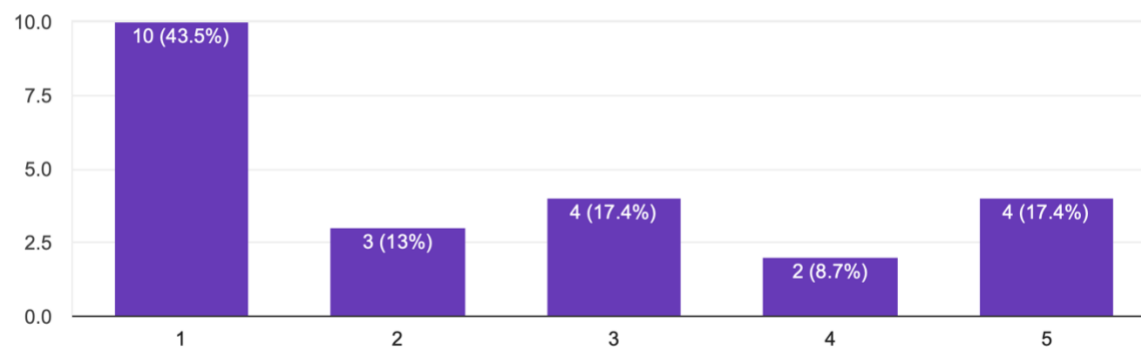
23 responses



Suggests capability is not the main issue affecting behaviour

18. Staff shortages affect safe food handling in my workplace.

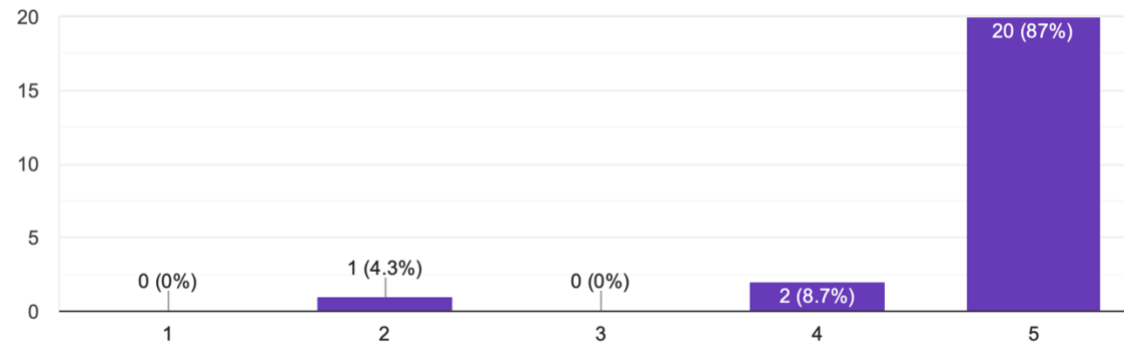
23 responses



This points structural factors plays a role in inconsistent compliance

19. Management takes food safety seriously.

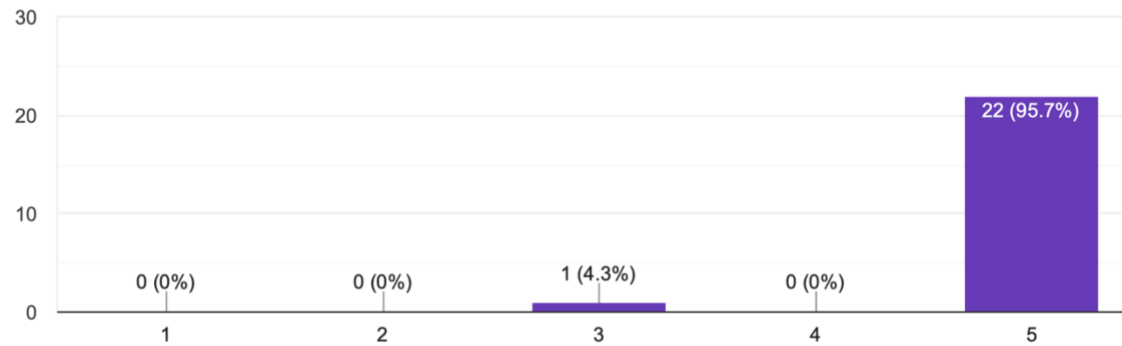
23 responses



This reflects a positive safety culture at a formal level

20. Food safety is prioritised even during busy periods.

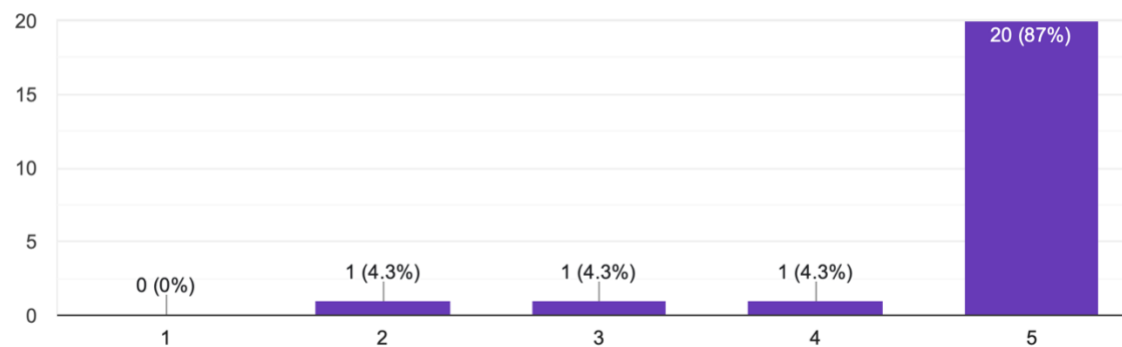
23 responses



However, this contradicts evidence of skipped procedures under pressure

21. Supervisors regularly monitor food safety practices.

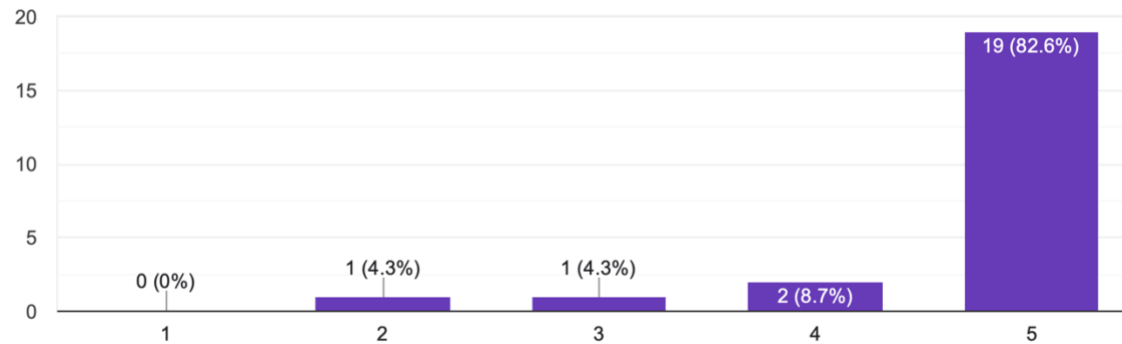
23 responses



Most respondents agreed that supervision is active and consistent. Monitoring appears to support enforcement of food safety standards

22. Food safety rules are strictly enforced in my workplace.

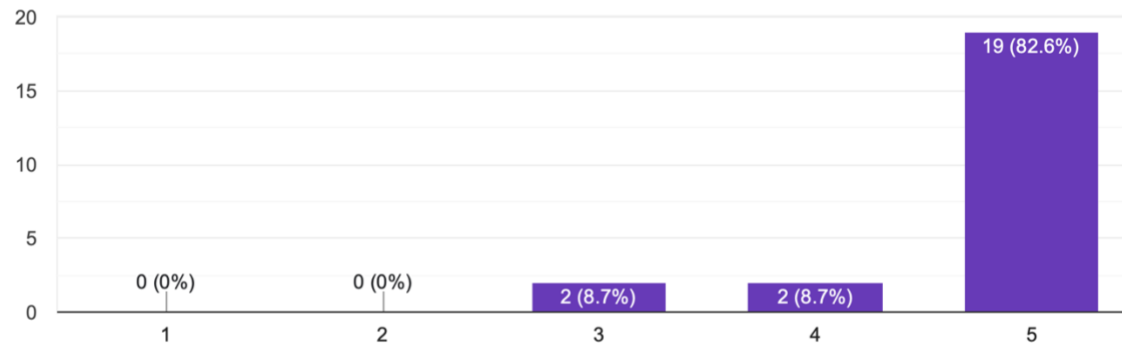
23 responses



Despite the majority, behavioural lapses still occur under pressure

23. The training I received reflects real kitchen or service conditions.

23 responses



This suggest the issue is not training design but situational constraints

24. In your opinion, what makes it difficult to follow food safety procedures consistently? 20 responses

Operational Stress and Time Constraints are major difficulties, primarily cited as busy peak hours, work pressure, and the resultant rush, where staff may feel pressured to cut corners. Human Error and Habits also make consistency difficult, including forgetting simple steps like washing hands or switching cutting boards. Gaps in Training and Knowledge are significant barriers, mentioned as a lack of regular refresher training, inadequate training, poor communication, or a general lack of knowledge and understanding of protocols. Staff Accountability and Management issues also contribute, such as when team members are not performing their roles properly, when management abilities are lost, or when procedures are not checked properly.

25. What would help staff follow food safety procedures more effectively? 19 responses

Training and Education: Staff need comprehensive, regular, and ongoing training that goes beyond initial induction, focusing on both the "what" and the "why" of food safety, along with continuous knowledge development.

Management Support and Leadership: Effective management involves setting strict rules, providing good supervision, offering clear procedures and simple instructions, and leading by example (e.g., consistently modelling correct behaviours like handwashing and PPE use).

Consistency and Practice: Following procedures is supported by constant practice, regular reminders (e.g., during morning briefings), and consistent follow-up on operational procedures.

Work Environment and Awareness: A good workplace setup, adequate staffing, and visual aids/reminders in key areas help reinforce procedures, coupled with staff self-awareness that food safety is a health matter.