



## Proposed Risk Mitigation for PT ABC to Maximize Income (Hospitality Industry Sector)

Nisa Mutia Hapsari<sup>1</sup>, Sylviana Maya Damayanti<sup>2</sup>

<sup>1,2</sup> School of Business and Management, Bandung Institute of Technology

**ABSTRACT:** The questions on the research are what are the risks that influence business PT ABC, what are the impacts of these risks, what are the mitigation techniques used to reduce the severity of the impacts. This study aims to identify and examine the risks that influence the business continuity and operations of the company PT ABC, aims to examine the impact of these risks and to investigate risk mitigation in reducing risk. Despite the global economic downturn, Indonesia continues to create increasing number of tourists. As tourists and businesspeople come to visit Indonesia, hotel demand is expected to grow in the next years and decades. Cotah (2019) why hotel investment fails because of not aligned with the right people / team, poor service and maintenance, inflexible management, blasted by new competition, cost overrun to starting any construction or renovation project and poor projection and not understanding location that weakening over time. However, without careful risk management the chance of failing is relatively high. The concept used is the risk management guideline by ISO 31000 which contains the scope, definition, principles, framework and process of risk management. The sources for risk identification research come from interviews and brainstorming. The Analytical Hierarchy Process (AHP) is used to make a risk analysis with the help of Expert Choice version 11 software to analyse the weight of the respondent's perspective, after obtaining the results of the risk evaluation then create a risk mapping to get the level of risk. Next, the final step is to create risk mitigation and implementation plans to reduce risk. Based on this research, 29 risk factors were found from 4 risk categories, which are Operational, People, Construction and Finance. There are 14 risk factors that are categorized at high risk level, then there are 7 risk factors that are categorized at a moderate risk level, and there are 8 risk factors that are categorized at a low risk level.

**KEYWORDS:** Analytical Hierarchy Process (AHP), Impact, ISO 31000, Likelihood, Risk Management.

### INTRODUCTION

As hospitality industry has offer opportunity, potential for business and innovation for its technology. But at the same time despite of high return in hospitality, it also has high risk. The risks occurred might vary, from the operational, human resource, financial, construction and so on. According to Katadata (2022) shown on Figure 1.1. PT ABC

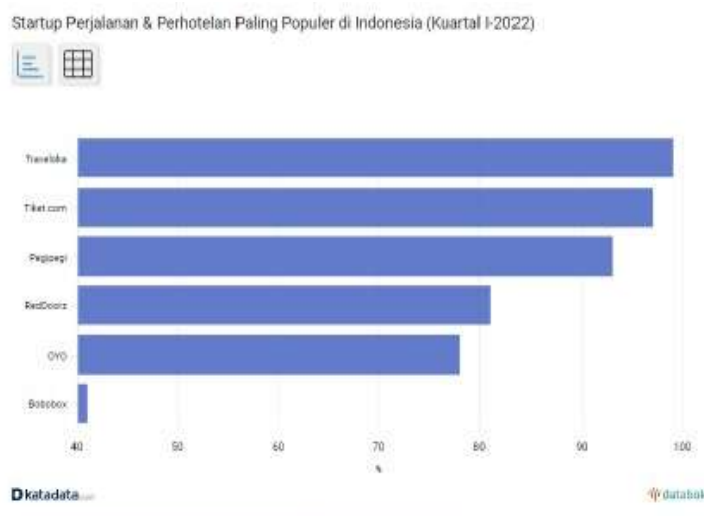


Figure I.1. Most popular travel & hospitality start-up in Indonesia

Human resource also contributing a risk to business that could delay overall business process. A risk in employee leave organization without proper replacement, skills gap, lack of manpower and new employee doesn't perform as what company expect can slow down the business to achieve its goal.

Current condition of company to risk that occurred is mostly reactive. However, this could bring result the company to cost higher. Based on that the company executive should become more proactive and well-prepared in facing various risk that the company have.

### LITERATURE REVIEW

A frequent definition of risk is the threat or possibility that an action or event will adversely or beneficially affect an organization's ability to achieve its objective while according to Odouza (2020) risk is defined as combination of severity when it happens and probability of an event – frequency of event x consequence of hazard. According to Bharwani and Mathews (2012) risk defined as probability or threat of a damage, injury, liability loss and other negative occurrence that is caused by external or internal vulnerabilities and that may be neutralised through pre-emptive action.

The risk management process involves the systematic application of policies, procedure and practices to the activities of communicating and consulting, establishing the context and assessing, treating, monitoring, reviewing, recording risk and the process is shown on figure II.1

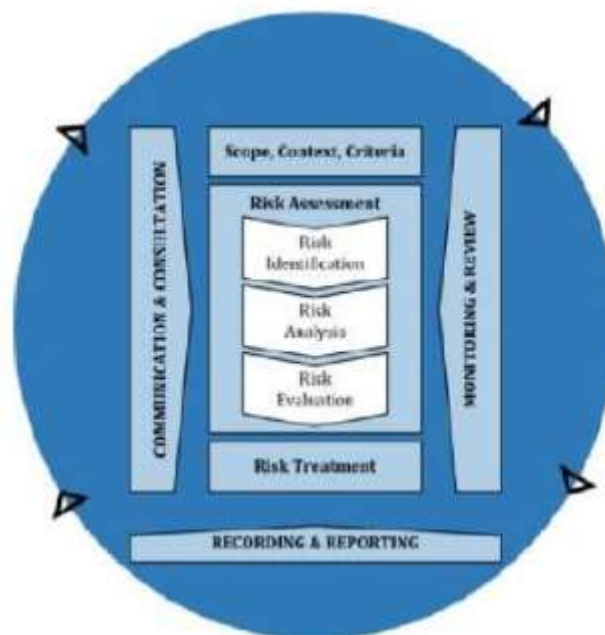


Figure II.1 Risk Management ISO 31000

According to figure 2.10. Risk management started from risk identification which identify occurring risk signals and determination of their sources and also defined as the process of analytical and constantly identifying, assessing and categorizing the initial importance of the risks related with the projects then followed by risk analysis which assess risks in terms of hazards and their consequences.

### METHOD

This research using primary data collected through a questionnaire and interview by selecting hospitality professionals at the company. The results of a questionnaire filled by 9 experts for the assessment. The respondents are the experts who served as head division of PT ABC. The data gathered from experts to gain insight into the key risks faced into four categories identified. Operational risk, human resource risk, financial risk, and construction risk. The respondents were also requested to rate the probability occurrence of these risks and its impact also indicate whether the business had strategies in place to mitigate these risks.



The Analytic Hierarchy Process (AHP) is a theory of measurement through pairwise comparisons and relies on the judgements of experts to derive priority scales. We need to elaborate the decision into four steps in order to make a decision in an organized way to generate priorities (Saaty, 2008). After data collection is done the next step is data analysis. Data analysis conducted using analytical hierarchy process (AHP) for quantitative data and qualitative data from interviews. The Analytical Hierarchy Process (AHP), introduced by Thomas L. Saaty (2008) is an effective tool for dealing with complicated decision making and may help the decision maker set priorities and make the best decision.

**RESULTS AND DISCUSSION**

After establishing scope, context and criteria then followed by risk assessment that consist of risk identification, risk analysis and evaluation. Risk identification is an activity that purposing to identify all potential risk that may help organization to achieve its objectives. To gain and gather data related with risk identification, author conducted interviews and brainstorming with the head of related department and also by literature review. It is resulting 4 types of risk in PT ABC which are operational, people, construction and financial. In addition, risk identification with description from brainstorming are provided in table IV.1.

Risk Category	Risk Factor	Risk Description	Impact	
Operational Risk	O1	Reputation	Bad review from past customers on internet	Bad review impacting new visitor won't come to the property
Operational Risk	O2	Insufficient water supply	water cannot ful fill the demand	bad experience and complaint from customers
Operational Risk	O3	Maintenance	maintenance of equipment can hinder hotel operation	Room unable to sell
Operational Risk	O4	Visitor Injured	injured by an accident such as fire from stove	Bad experience and complaint from customers
Operational Risk	O5	Disturbed Visitor	during night hours noise complaint from customers	Bad experience and complaint from customers
Operational Risk	O6	Visitor Bad Behaviour	the hotel provided public restroom that bad visitor can peep others and abuse	Bad experience and complaint from customers

According to ISO 31000:2018 the step after identifying risk is to perform risk analysis or risk measurement. The analysis using likelihood and impact attributes for each risk. Likelihood indicates how often risk happened in business operation, impact is used to identify the effect that resulted from risk occurred that can degrade performance or adversely affects the business operation. In addition, the likelihood and impact to determine risk level.

The first step in risk analysis is structuring the problem into hierarchy. The identification process transformed into hierarchy as shown on figure IV.1

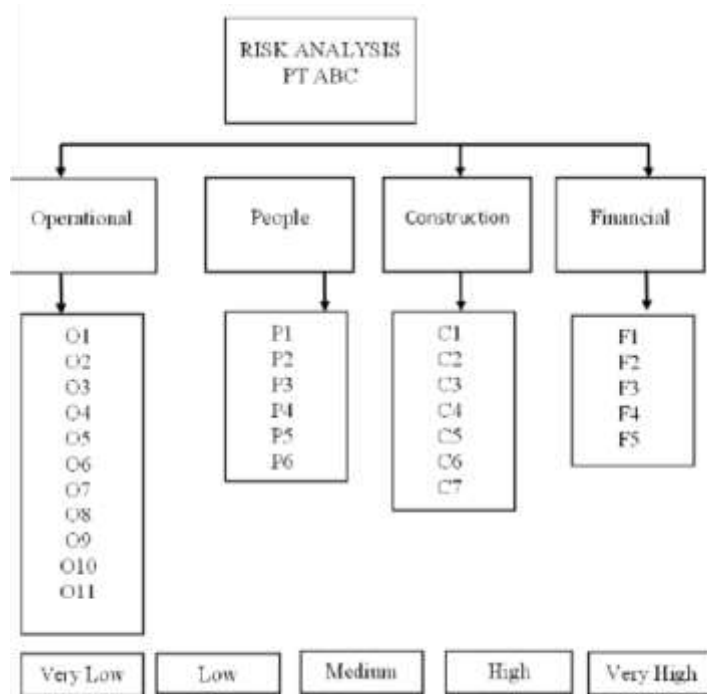


Figure IV.1. Hierarchy of Risk Analysis PT ABC

Risk Category		Risk Factor	Risk Code	Weight	Ranking
Operational Risk	0,517	Reputation	O1	0.0863	1
		Insufficient water supply	O2	0.0579	4
		Maintenance	O3	0.0693	2
		Visitor Injured	O4	0.03	9
		Disturbed Visitor	O5	0.0295	10
		Visitor Bad Behaviour	O6	0.0336	7
		Local council	O7	0.0269	11
		Unoccupied property	O8	0.0476	5
		Signal Interference	O9	0.0305	8
		Natural Disaster	O10	0.0445	6
		Possibility of damage property	O11	0.0615	3
People Risk	0,155	The candidate hardly to find and fit with the organization	P1	0.0369	1
		New employee doesn't match with expectation	P2	0.0343	2
		Employee hijacking	P3	0.0189	5
		Unsatisfied employee	P4	0.0197	4
		Low Capabilities of employee	P5	0.0172	6
		Employee leaving without proper replacement	P6	0.0281	3



Construction Risk	0,101	Material shortage	C1	0.0096	5
		Material coming late from vendor	C2	0.0109	6
		Material received different with specification	C3	0.0097	7
		Inadequate man power	C4	0.0148	4
		Skills gap from workers	C5	0.0149	3
		Local citizen intervention	C6	0.0208	1
		Material loss	C7	0.0202	2
Financial Risk	0.227	Repair & Maintenance Cost	F1	0.0493	2
		Cancelled booking	F2	0.0808	1
		Average Rate Room (ARR)	F3	0.022	5
		Loss in exchange rate	F4	0.0313	4
		Fraud / Financial loss	F5	0.0436	3

According to the results of AHP analysis and interview below is the explanation of each category:

1. Operational Risk

Operational risk refers to the events that disrupts business operation. Operational risk sums up the uncertainties and hazards a company faces when it arranges to do its day-to-day business activities. The highest factor in operational risk category is reputation with the 0,086 of weight and has medium and has medium-level likelihood and high-level impact. Any customers that have completed a stay at the property would be asked for a review on the online travel agents in which app they made a book for their experience during the stay. Any positive comments would attract new customer for orders while bad review is a risk that impacting customer wouldn't come and make the company generate less revenue.

2. People Risk

People is key asset for an organization as they are essential contributors towards profits and shareholder value and at the same time also represent a risk. Risk incurred can be resulted from individual making risky or adverse decisions to organization. From the result of analysis, the highest factor in people risk category is the candidate hardly to find and fit with the organization with risk result of likelihood in medium level and high level of impact while the weight is 0,037. As the company need specific skills, education and experience it takes time that long to fulfil the vacancy that impacting slower business process. As company find difficulties to find people that fit the organization, hiring new talents that incompatible with their skills and behaviour would be costly for company.

3. Construction Risk

Construction contributing risk factor to the development of the property as it could have negative effect on the development cost or influence the future return on investment. From the analysis it resulted that local citizen intervention contributing the highest level of risk with result of likelihood is medium and impact level is high while the weight is 0,021. Local citizen interrupted the construction as the company established its branches in remote area over Indonesia. Local citizen interrupted during construction they also hinder the shipping of material. What the local citizen did hinder overall of construction process it resulted the company have to delay the construction and missed the target of opening the branch.

4. Financial Risk

Financial risk contributing risk factor to the business. Financial risk impacting the possibility of losing money to the investment and business venture. Based on the result of analysis the highest risk factor is cancelled booking and the weight is 0,081. The result shows that likelihood is medium, and the impact is also high According to the company, they regularly refunding orders the customers and this impacting the company unable to generate revenue and this would also decrease the possibility of others customers to make an order as they already booked before by previous customers who had make cancelled booking. Cancelled booking incurred because of various reasons.

Below is the result of AHP analysis



Risk Category	Risk Factor		Likelihood	Impact
OPERATIONAL	Reputation	O1	Medium	High
	Insufficient water supply	O2	Medium	Medium
	Maintenance	O3	Medium	High
	Visitor Injured	O4	Low	Medium
	Disturbed Visitor	O5	Very Low	Low
	Visitor Bad Behaviour	O6	Very Low	High
	Local council	O7	Very Low	Medium
	Unoccupied property	O8	Low	Medium
	Signal Interference	O9	Low	Low
	Natural Disaster	O10	Low	Very High
	Possibility of damage property	O11	Medium	High
PEOPLE	The candidate hardly to find and fit with the organization	P1	Medium	High
	New employee doesn't match with expectation	P2	Medium	High
	Employee hijacking	P3	Low	Low
	Unsatisfied employee	P4	Medium	Medium
	Low capabilities of employee	P5	Very Low	Medium
	Employee leaving without proper replacement	P6	Medium	High
CONSTRUCTION	Material shortage	C1	Very Low	High
	Material coming late from vendor	C2	Very Low	Low
	Material received different with specification	C3	Very Low	Low
	Inadequate man power	C4	Low	High
	Skills gap from workers	C5	Low	Medium
	Local citizen intervention	C6	Medium	High
	Material loss	C7	Medium	High
FINANCIAL	Repair & Maintenance Cost	F1	Low	High
	Cancelled booking	F2	Medium	Medium
	Average Rate Room (ARR)	F3	Medium	Very Low
	Loss in exchange rate	F4	Very Low	Low
	Fraud	F5	Very Low	Medium

Risk Factor		Level of risk	Risk Mitigation	Action Plan
Reputation	O1	High	Reduce	Maintain and improve facilities to satisfy customers
Maintenance	O3	High	Reduce	Perform regular maintenance
Possibility of damage property	O11	High	Reduce	Choose durable furnishings, set clear rule and guidelines for guests and provide manual to use property
The candidate hardly to find and fit with the organization	P1	High	Transfer	Use third party such as head hunter to hire people that fit with organization
New employee doesn't match with expectation	P2	High	Reduce	Create on boarding program guidelines to achieve the goals



Employee leaving without proper replacement	P6	High	Reduce	Create regulation with strict rule regarding exit employee to handover new employee
Local citizen intervention	C6	High	Reduce	Include local citizen in the establishing property branch during construction until the business is operating
Material loss	C7	High	Transfer	Use third party to insurance the material loss
Insufficient water supply	O2	High	Transfer	Use third party to supplies water fast
Unsatisfied employee	P4	High	Reduce	Create regular employee aspiration to deliver their opinions to management of the company
Cancelled booking	F2	High	Reduce	Reduce accepted reasons on people who cancelled the book
Repair & Maintenance Cost	F1	High	Reduce	Create proper budgeting on the cost and charge money deposit on every customer who stayed to guarantee repairment if needed
Inadequate man power	C4	High	Reduce	Loosen hiring criteria
Natural Disaster	O10	High	Reduce	Create building that resistant to earthquake, create deep analysis regarding the environment
Signal Interference	O9	Medium	Reduce	Adding extra wi-fi providers
Visitor Injured	O4	Medium	Reduce	Create manual guidelines on how equipment is used and evaluate equipment that has potential of hazardous, protect using insurance
Unoccupied property	O8	Medium	Reduce	Create strong marketing plan that keep the demand of product high
Employee hijacking	P3	Medium	Reduce	Evaluate compensation and benefit program that match with current market and industry
Skills gap from workers	C5	Medium	Reduce	Provide adequate training, coaching and mentoring with senior labours
Visitor Bad Behaviour	O6	Medium	Reduce	Screening all the customers
Material shortage	C1	Medium	Reduce	Improve forecasting, lead time accuracy and improve supplier collaboration
Average Rate Room (ARR)	F3	Low	Accept	Run loyalty programs
Material coming late from vendor	C2	Low	Accept	Expedite parts – pays extra fees for faster delivery and quality
Material received different with specification	C3	Low	Accept	Dual-source supplier and eliminate single point failures
Loss in exchange rate	F4	Low	Accept	Hedging
Disturbed Visitor	O5	Low	Accept	Create announcement regarding silent hours and regularly monitor during silent hours
Fraud	F5	Low	Accept	Convert any transaction into online
Local council	O7	Low	Accept	Understanding and regularly doing research on regulation at all level of governments and create good relationship with all level of governments
Low Capabilities of employee	P5	Low	Accept	Provide regular training



The implementation plan is a set of actions that proposed to be adopted by the company based on risks that have been identified for reducing the likelihood and the impact. This proposed implementation plan is approved by the company.

1. Reputation

Reputation categorized as high level of risk. The source is from bad reviews on the internet. Reviews is a concern for the company as this would lead prospective new customers read review and change their mind to not make an order in the property. The first step to enhance the reputation is by maintaining current customers satisfaction as company improve their facilities and services. Company can monitor by encourage current visitors to give positive feedbacks and asking their experience in advance after finishing their stays before posted on the internet. Any positive reviews and interesting comments would be given a reward.

2. Maintenance

Maintenance categorized as high level of risk, how to face this risk is by monitoring the equipment regularly. Choosing items that are simple to clean and purchase durable items and pick darker colour of fabrics.

3. Possibility of damage property

Possibility of damage to the property categorized as high level of risk. How to reduce the risk is by providing clear guidelines on how the property is used. Monitor regularly the property and add charge to customer for security deposit to cover minor damages

4. The candidate hardly to find and fit with the organization

The candidate hardly to find and fit with the organization categorized as high level of risk. How to face the risk is by asking help to another party for certain positions to headhunter and attract talent from broader pools such as industry training programs, virtual and non-virtual job fairs.

5. New employee doesn't match with expectation

New employee doesn't match with expectation categorized as high level of risk. How to face the risk is by create on boarding program effectively to meet the expectation of the user, regularly review the probation to match the expectation. And create training program that useful for new employee also create apprenticeship program for entry level.

6. Employee leaving without proper replacement

Employee leaving without proper replacement categorized as high level of risk. How to face the risk is by create proper and strict regulation regarding employee exit. The prior employee should train the newcomers for at least 1 month before they are leaving the company

7. Local citizen intervention

Local citizen intervention categorized as high level of risk. How to face the risk is by including any business operation of PT ABC with local citizens. From construction phase, company should encourage potential local citizens at least few people as a labour to accelerate the construction process or promising them that local citizen would take part as daily worker when the property is already finished established.

8. Material loss

Material loss categorized as high level of risk. How to face the risk is by taking carefully any material that the company has and standardized the saving of any material. This also can be collaborated with other party such as insurance to reduce the risk of loss.

9. Insufficient water supply

Insufficient water supply categorized as high level of risk. How to face the risk is before considering to established a property, company should create feasibility study regarding quality and quantity of the water and calculate the estimation of water required with the actual water needed when it is operated. Company can collaborate with another party to provide additional water supplies.

10. Unsatisfied employee

Unsatisfied employee categorized as high level of risk. How to face the risk is by company should perform regular employee's aspiration regarding their career and review it to match with company's goal. Create training and development program for employees also create proper compensation and benefit program in order to satisfy them such as bonus, health benefits and regular family outing.

11. Cancelled booking

Cancelled booking categorized as high level of risk. How to face the risk is by tighten the policy and regulation regarding cancellation. For example, the cancellation only accepted for only force-majure reasons. Company can also replace cancelled booking by changing the policy with voucher for reschedule or book for other date.





## 12. Repair & Maintenance Cost

Repair and maintenance cost categorized as high level of risk. How to face the risk is by create proper budgeting regarding maintenance and repair cost and limit them to certain budget of money. Collaborate with other party to lower the cost of repairment. And it also can be charge to customers for any repairment should made after their stay.

## 13. Inadequate manpower

In adequate manpower categorized as high level of risk. How to face the risk is by loosen hiring criteria. Current conditions of company is labour that utilized is come far from the site of construction and they often asking for coming back to their hometown that spend a long time as the company has target of time to open the property. Company can utilize local citizen around the site that has good capabilities to construct and this would reduce the risk of inadequate of man power. Company can also implement overtime working hours to the labors to cover inadequate man power by compensate with overtime wages.

## 14. Natural Disaster

Natural disaster categorized as high level of risk. How to face the risk is by creating feasibility study of property before its establishment whether the property is located near the source of disaster or no such as whether it is near a big tree that has potential to fall. Create property that resistant to earthquake and hurricane. Provide facilities with assembly point and educate the staff with mitigation of natural disaster to reduce the impacts and the last provide the customers with emergency phone numbers.

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