



## **Materiality Assessment Approach**

AOT annually conducted the materiality assessment to identify three significant levels of issues harmonized with the GRI2021 which double materiality is specified. The results showed that there were three levels of material issues, i.e., Most Significant, Highly Significant, and Significant.

# Understand the AOT's context



AOT compiles business activity data related to 7 major stakeholder groups throughout the value chain and review the sustainability development trends of transportation infrastructure.

# **Identify impacts**



Integrating AOT ERM process and double materiality principle and GRI 2021, AOT identifies positive and negative impacts/ already exist and may possibly occur in the future/in short and long terms / solvable and insolvable from business activities through the engagement of 7 major both internal and external stakeholder groups and sustainability experts.

# **Evaluate** impacts



AOT evaluates impacts from AOT's business activities on stakeholders by compiling and integrating the evaluation results of 7 stakeholder groups and experts with enterprise risk management guidelines.

# Prioritize materiality for reporting



AOT Prioritizes the materiality of impacts by concluding the impact groups with the highest scores to be the material issue on sustainability and receive approval from board of directors before reporting them in this Sustainable Development Report.



## Understand the organization's context

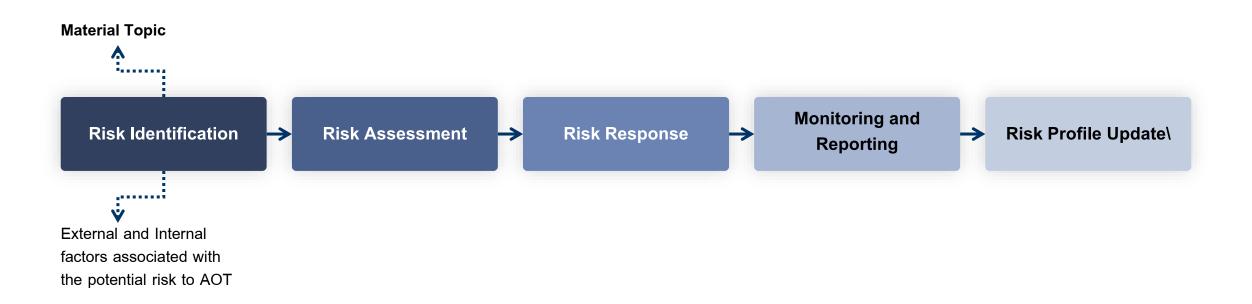
	Important Sustainability Issues	Scope of Impacts on Stakeholders						
		Internal External						
		AOT Employees	Customers	Business Partners	Regulators	Communities and Societies	Mass Media and Online Media	Shareholders, Investors, and Securities Analysts
	Corporate Governance, Risk Management, and Work Compliance	<b>✓</b>	✓	✓	<b>~</b>	<b>√</b>	<b>√</b>	✓
	Airport Capacity and Accessibility		<b>✓</b>	✓		✓		<b>✓</b>
. E	Customer Satisfaction		<b>✓</b>	✓			<b>√</b>	
Economic	Sustainable Supply Chain		~	~		✓	~	
ШО	Business Alliances		<b>✓</b>	~				<b>√</b>
	Digital and Innovation	~	<b>√</b>	✓	<b>✓</b>	<b>✓</b>		✓
	Information Technology and Privacy	✓	<b>✓</b>	<b>✓</b>	~	✓	✓	<b>✓</b>
	Occupational Health and Safety	✓	~	~	~	✓	~	
	Participation with Community and Society	<b>✓</b>	<b>✓</b>	✓	~	<b>✓</b>		
Social	Participation with Community and Society	✓			~	✓	✓	
S	Human Rights	<b>✓</b>	<b>✓</b>	~	~	<b>√</b>	~	<b>√</b>
	Valuable and Life Fulfilling	<b>✓</b>						
Enviromental Dimension	Energy and Climate Change		~	~	~	✓		✓
	Water and Wastewater Management				~	✓	~	
	Circular Economy (Waste Management)		~	~	~	✓		
	Noise Impacts				<b>✓</b>	<b>✓</b>	<b>✓</b>	

AOT mapped materiality issues in different three sustainable aspects to the stakeholders of AOT, including management & employee levels, customer, business alliances, governance agency, shareholders, and community & society.



# Integration of materiality assessment in company's enterprise risk management

AOT identifies the potential risk that can be threaded to business continuity regarding the organization's strategic plan. This has been included any potential incidents and further changes related to the trends, technologies, social context, behavior change, and geopolitical. Materiality is also deemed the potential risks to AOT that is accounted into the identified risk toward risk assessment to optimize the severity of particular risks.





## **Materiality Issues in 2023**

In 2023, AOT conducted the materiality assessment to identify three significant levels of issues harmonized with the GRI2021. The matrix results showed that there were three levels of material issues, i.e., Most Significant, Highly Significant, and Significant.

#### **Most Important**

- Infrastructure, airport capacity and business opportunity
- Digital technology and innovations
- Energy and climate changes
- Customer satisfaction
- Airport safety and

#### **Very Important**

- Corporate governance, risk management and business ethics
- Human rights
- Participation in communities and society
- Human resource development

#### **Important**

- Information technology security and privacy
- Supply chain management
- Environmental and natural resource management
- Occupational Health and safety of employees

# Human rights Customer satisfaction Airport safety and security Occupational Health and safety of employees Participation in communities and society Human resource development Environmental and natural resource management Energy and climate changes Corporate governance, risk management and business ethics Information technology security and privacy Supply chain management Infrastructure, airport capacity and business opportunity Digital technology and innovations

#### **Materiality Matrix**



Economy

Environment

Society



## Material Issues for Enterprise Value Creation: Business Case

#### **Customer Satisfaction**

The alignment between AOT's operation, international service standards, and listening for the suggestions to improve the service continuously directly affect the satisfaction and confidence of AOT customers, including passengers, airlines, and entrepreneurs. Moreover, providing impressive service beyond expectations creates a positive image for Thailand.

Airport management and operation is an activity that directly affects customer satisfaction, including passengers, airport entrepreneurs (e.g., shop owners and other service providers), and airlines which link to AOT's revenue generation. By responding to customer needs, AOT aims to satisfy each group of stakeholders in a balanced manner under international safety and security standards and service standards, along with creating a positive image for the airports in the country

#### Airport Safety and Security

Airport Safety and Security pose risk among the most crucial elements in airport operations because aviation business offers transnational and domestic transportation platform which supports the mobility of various groups of people and objects. Thus, it is a main mission for AOT to uphold the confidence in safety and security for airport users, not only for our business but also for economic of the country. With this respect, AOT established an Aerodrome Safety Policy to consistently comply with the international standard in the safety and security context for all 6 airports.

#### Digital and Innovation

The growth of digital technology is an opportunity for AOT to improve the efficiency of internal processes through precise and timely business decision, as well as, to capture business opportunities that come with the technology such as service improvement, customer experience optimization and commercial development. At the same time cybersecurity and privacy protection are a rising public concern that may negatively affect user's trusts if AOT fails to address proactively. Thus, AOT is placing high importance on developing digital innovation along with cybersecurity and privacy protection to enable a sustainable digital service expansion, gain trust from users and consistently generating revenue in the long-term.

Additionally, digital and innovation have been integrating into the business operation to improve overall performance throughout the consideration concern environmental impacts, e.g., energy, material utilization, waste, biodiversity, and emission.



## Material Issues for Enterprise Value Creation: Business Strategy

#### **Customer Satisfaction**

AOT provided the Master Business Plan for the fiscal years 2023-2027 to compile various business plans and projects which responded to the major objectives of AOT's Corporate Plan for the fiscal years 2023-2027 revised edition (fiscal year 2023) in order to prepare its readiness for the future business competitiveness and passenger growth. This enabled AOT to set plans and projects to respond to the revenues generation policy from aeronautical and non-aeronautical businesses and implement the relevant operations of business development according to each business segment in line with the main strategies of AOT's Corporate Plan while directly responding to customer needs and expectations.

AOT creates customer satisfaction through the analysis of airport service touchpoints by integrating data from the airport service assessment in 3 parts: both quantitative data, i.e., Level of Service (LoS), and qualitative data, i.e., Airport Service Quality (ASQ) and Customer Feedback.

#### Airport Safety and Security

AOT deemed Safety & Security as a foundation and to serve AOT operation. A safety committee, chaired by the President, was established to be responsible for policy making, monitoring, and overseeing safety and security operations. AOT established and implemented Aerodrome Manual, Safety Management System (SMS), Safety and security management process. We regularly raise safety awareness among employees, customers, and other airport users to ensure that all areas under AOT operations are safe and properly managed in line with national and international standards. This is also aiming to prevent any unforeseen incidents that can be happened to both internal and external stakeholder of AOT.

#### Digital and Innovation

AOT has proceeded on the AOT Digital Action Plan of the fiscal years 2020-2024 (Revised edition) which consisted of 4 strategic issues, including Smart Service, Digital Organization, Digital Governance and Digital Literacy, and Smart and Security Infrastructure. By means of digital transformation, the organization was developed in holistic manner to become a digital organization of which potentiality and business competitive capacity were enhanced by digital technology. There were 3 main factors that required to be transformed for an achievement, encompassing people, process, and technology.

AOT operates in accordance with its Innovation Master Plan of the fiscal years 2020-2024 (Revised edition) which consisted of 5 strategic issues (Innovative Organization, Digital Transformation for All, Service Excellence, Non-Aero: Business Model Innovation, Sustainable AOT) under the management of the Innovation Projects and 6 management procedures (Idea, Proof of Concept, Prototype Evaluation, Development, Implementation, Assessment) to promote AOT to become a Sustainability Organization.



# Materiality Metrics for Enterprise Value Creation Customer Satisfaction



Target Year - 2027 Progress Executive Compensation

Building the capability of AOT within the context of customer relationship though the satisfaction assessment can be set as a target to perceive how AOT organize this issue and address in the effective approach. Customer satisfaction has been evaluated annually by using Airport Service Quality (ASQ) as an indicator to evaluate the outcome associated with the defined target. The evaluation focused on passenger satisfaction by using the same global questionnaire for airport service reviews. including ground transportation, check-in, facilities, restaurants, restrooms, hygiene, and the atmosphere inside passenger terminals. In particular, the target of ASQ has been set based on the various indicators, i.e., Curbside, Parking, Security, Boarding, Baggage Claim, Shop & Restaurant, Trolley, Airport Staff, Safe & Secure, Transport, Check-in, Passport (Departure), Public Passport (Arrival), Customs, Restrooms, Wi-Fi, and Cleanliness of Airport Terminal.

The target progress has been acquiring through the online customer satisfaction survey. Moreover, the complaints and suggestions channels are opened for further improvement in order to improve the quality of service, build competitiveness, and review the complaints management guidelines for maximum efficiency. The result of ASQ in 2023 from all 6 airports was equal to 4.17 which was higher than the ASQ of 2022.

AOT has established the "Understanding Customer Needs Project for the fiscal years 2023-2024" that covers all customer groups, such as passengers, entrepreneurs and airlines at AOT's 6 airports, by conducting a survey according to the nature of each sample group, such as, sending link or QR code which contains questions through the electronic mail (E-mail), face-to-face and in-dept interviews.

The KPIs have been set consistently with the customer satisfaction survey and expected target. The results have been evaluated in line with the actual outcome in response to the KPI's target. The metric is used to determine the compensation of the executive committee (level 9 - 11). In item 5, the customer satisfaction KPI is Airport Service Quality (ASQ). The actual result of ASQ determines the performance and compensation of executives. For example, if the actual score of ASQ 4. That is, the performance of the executive committee is deemed as "good" (3 out of 5)





Tonio	Evaluation Criteria					
Topic	Very Poor (1)	Poor (2)	Fair (3)	Good (4)	Very Good (5)	
Marketing stimulation for flights (Incentive Scheme) at 6 airports of the AOT	Coordinate with airlines to join and provide project details	Public relations via AOC/Email	Follow up on the results of the project in increasing the number of flight routes	Summarize the results monthly and prepare reports for analysis	Arrange reports to present to the committee for review	
Number of new flight routes (winter schedule)	Collected very few data on new flight routes	Analyzed and estimated part of the winter flight schedule	Submitted the project budget within early October 2023	Number of new flight routes increased by 1	Number of new flight routes increased by 2 or more	
Number of new flight routes (Summer schedule)	Submit project discount by the end of April 2024 (Winter schedule 2023)	Prepare a summary report of the project discount for the winter flight schedule for the management to be informed	Number of new flight routes increased from phase 2 by 1 flight route	Number of new flight routes increased from phase 2 by 2 flight routes	Number of new flight routes increased from phase 2 by 3 flight routes	



# Materiality Metrics for Enterprise Value Creation Customer Satisfaction

Tonio	Evaluation Criteria (Percentage)					
Topic	Very Poor (1)	Poor (2)	Fair (3)	Good (4)	Very Good (5)	
Speed of the inbound process for international passengers within 45 minutes	80	85	90	95	100	
Speed of the outbound process for international passengers within 45 minutes	80	85	90	95	100	
Speed of the inbound process for domestic passengers within 45 minutes	80	85	90	95	100	
Speed of the outbound process for domestic passengers within 45 minutes	80	85	90	95	100	



# Materiality Metrics for Enterprise Value Creation Airport Safety and Security

# **E**AOT

#### Target Year - 2027 Progress Executive Compensation

AOT sets long term safety and security targets in 2027 as follows:

- 1. 100% of airports which have received annual safety assessments
- 2. 100% of security operations that continuously comply with government regulations and international standards
- 3. 0 case of numbers of runway accidents caused by operational errors made by AOT's employees (case per 1,000 flights)

According to the target/ matric for airport safety and security issues, the progress has been evaluated annually as shown below:

- 1. 100% of security operations must continuously comply with government regulations and international standards
- 2. 100% of airports which have received annual safety assessments
- 3. 0 case of runway accidents caused by operational errors made by AOT's employees (case per 1,000 flights)

The KPIs of airport safety and security topic constitute two types of KPIs, i.e., strategic KPIs and accountability KPIs. These two KPIs has used as parameters in the milestone achievement evaluation of president and executive. The expected outcome of each KPIs associated with the airport safety and security mostly was the qualitative data which has been conducted to perform the accomplishment in the practice. The metric is used to determine the compensation of the executive committee (level 9 - 11). In item 7, the Airport Safety and Security is Completion of the runway safety program by the end year. If the executives are able to achieve the runway safety program, their performance appraisal will be "excellent" (5 out of 5).



# Materiality Metrics for Enterprise Value Creation Airport Safety and Security

Topio	Evaluation Criteria					
Topic	Very Poor (1)	Poor (2)	Fair (3)	Good (4)	Very Good (5)	
Promoting the use of CUSS system (1 <sup>st</sup> Phase)	Appointing a working committee to develop a promotion plan for the use of CUSS system	Collect statistics on the usage of the CUSS system after installation	Study, collect data, and analyze issues and pain points in using the CUSS system	Organize meetings to listen to issues and feedback from relevant stakeholders	Collect data on issues and concerns, and summarize the analysis results	
Promoting the use of CUSS system (2 <sup>nd</sup> Phase)	Develop a plan to promote the use of the CUSS system.	Approval of the plan by the working committee.	Present to the board of directors for review and approval to proceed.	Implementation progress according to the plan is 80%	Implementation progress according to the plan is 100%	





Target Year - 2026 Progress Executive Compensation

AOT has been setting the "target or metric to measure the progress on digital and innovation issue in a systematic way" with six steps of AOT's innovation management process. The six systematic steps tracking comprise idea, proof of concept, prototype evaluation, development, implementation, and assessment.

As for 2023 progress, There were over 40 innovative works arising from exchanging of innovative concepts during operations between AOT and stakeholders' groups according to AOT's innovation management framework. There were 9 innovative concepts on actual implementing and assessing, such as Baggage Tracking System, Flight Formality Data Delivery and Recording, etc.

The summary of Innovation Management Results was categorized in different steps as follow:

Step 1: Idea - 19 projects

Step 2: Proof of Concept - 17 projects

Step 3: Prototype evaluations- 0 projects

Step 4: Development - 1 projects

Step 5: Implementation - 2 projects

Step 6: Assessment - 7 projects

The digital and innovation as part of material issues constitute the KPI for both president and executive in implementing the integrated digital and innovation into the AOT's business and operation – such as:

- Achievement toward digital platform operation,
- The no. of approved innovative project by committees
- The no. of innovation's prototype
- The no. of approved innovative projects that have been developed from the prototype

The accomplishment had defined for both president and executive level for the expected outcome. An anticipated result of digital and innovation integration of AOT has been aligned with the digital strategy with respect to the master plan of AOT, which reflects to the KPIs of president and executive for the achievement.





# Materiality Metrics for Enterprise Value Creation Digital and Innovation

Tonio	Evaluation Criteria					
Topic	Very Poor (1)	Poor (2)	Fair (3)	Good (4)	Very Good (5)	
Promoting the use of CUSS system (1 <sup>st</sup> Phase)	Appointing a working committee to develop a promotion plan for the use of CUSS system	Collect statistics on the usage of the CUSS system after installation	Study, collect data, and analyze issues and pain points in using the CUSS system	Organize meetings to listen to issues and feedback from relevant stakeholders	Collect data on issues and concerns, and summarize the analysis results	
Promoting the use of CUSS system (2 <sup>nd</sup> Phase)	Develop a plan to promote the use of the CUSS system.	Approval of the plan by the working committee.	Present to the board of directors for review and approval to proceed.	Implementation progress according to the plan is 80%	Implementation progress according to the plan is 100%	
Success in operation on digital platform	Output 1 plan completed as scheduled	Output 2 plan completed as scheduled	Output 3 plan completed as scheduled	Output 4 plan completed as scheduled	Outcome 1 plan completed as scheduled	



## **Board Acknowledgement for materiality assessment result**



1. ตามเห็นชอบ ผอญ.เมื่อวันที่ 26 ก.ค.66 ท้ายหนังสือ ทอท.ที่ 9283/66 ลงวันที่ 25 ก.ค.66 เรื่อง แจ้งรายละเอียดการดำเนินงานด้านความรับผิดชอบต่อสังคมเพื่อพัฒนาสู่ความยั่งยืน ประจำปี 2566 - 2567 ให้ ฝกส.และบริษัท อีอาร์เอ็ม-สยาม จำกัด (ERM) ซึ่งเป็นที่ปรึกษาในการจัดทำรายงานการพัฒนาอย่างยั่งยืน (SD Report) ประจำปี 2566 ดำเนินการจัดประชุมเชิงปฏิบัติการร่วมกับผู้มีส่วนได้เสียภายนอกของ ทอท.เพื่อประเมิน ประเด็นสาระสำคัญด้านความยั่งยืนของ ทอท.ประจำปี 2566 และนำเสนอผลการประเมินดังกล่าวในรายงานการพัฒนา อย่างยั่งยืนของ ทอท. (SD Report) ประจำปี 2566 นั้น

2. ฝกส.ร่วมกับ ERM ทบทวนประเด็นสาระสำคัญฯ ประจำปี 2566 โดยเปรียบเทียบประเด็นสาระสำคัญฯ ประจำปี 2565 พบว่า ประเด็นสาระสำคัญฯ ดังกล่าว ยังคงมีความเหมาะสมกับสถานการณ์ปัจจุบันที่สามารถนำไปใช้เป็น ข้อมูลตั้งต้น สำหรับกระบวนการประเมินความรุนแรงของผลกระทบที่มีต่อผู้มีส่วนได้เสียทั้งภายในและภายนอก ประจำปี 2566 ได้ อย่างไรก็ตาม การประเมินประเด็นสาระสำคัญฯ ประจำปี 2566 ได้มีการปรับเปลี่ยนชื่อและรวมประเด็นที่มี ความคล้ายกันเข้าด้วยกัน จึงทำให้ประเด็นสาระสำคัญฯ ปรับจาก 16 ประเด็นเหลือ 13 ประเด็น โดยมีรายละเอียด ดังนี้

#### Materiality Topic of AOT in 2023

ประเดินสาระสำคัญ	บูด้านความยังยืนของ ทอท.	
ประจำปี 2565	ประจำปี 2566	
1. ความพึงพอใจของลูกค้า	1. ความพึงพอใจของลูกค้า	
2. พันธมิตรทางธุรกิจ	2. โครงสร้างพื้นฐาน ขีดความสามารถในการรองรับ	
<ol> <li>ขีดความสามารถในการรองรับและการเข้าถึง ท่าอากาศยาน</li> </ol>	และโอกาสทางธุรกิจ	
<ol> <li>การกำกับดูแลกิจการ การบริหารความเสี่ยง และการกำกับดูแลการปฏิบัติงาน</li> </ol>	<ol> <li>การกำกับดูแลกิจการ การบริหารความเสี่ยง และจริยธรรมในการดำเนินธุรกิจ</li> </ol>	
5. ห่วงโซ่อุปทานที่ยั่งยืน	4. การจัดการห่วงโช่อุปทาน	
6. ติจิทัลและนวัตกรรม	5. เทคโนโลยีดิจิทัลและนวัตกรรม	
<ol> <li>พลังงานและการเปลี่ยนแปลงสภาพภูมิอากาศ</li> </ol>	6. พลังงานและการเปลี่ยนแปลงสภาพภูมิอากาศ	
8. เศรษฐกิจหมุนเวียน (การจัดการขยะ)	7. การจัดการทรัพยากรธรรมชาติและสิ่งแวดล้อม	
9. ผลกระทบทางเสียง	(การจัดการน้ำและน้ำเสีย ผลกระทบทางเสียง	
10. การจัดการน้ำและน้ำเสีย	เศรษฐกิจหมุนเวียน และความหลากหลายทางชีวภาพ	
11. ความปลอดภัยและการรักษาความปลอดภัย	8. ความปลอดภัยและการรักษาความปลอดภัย	
ในท่าอากาศยาน	ในทำอากาศยาน	
12. อาชีวอนามัยและความปลอดภัยของผู้ปฏิบัติงาน	9. อาชีวอนามัยและความปลอดภัยของผู้ปฏิบัติงาน	

Review and Approval of Materiality Assessment Result in 2023

In 2023, AOT sent the report of materiality topic to the board to acknowledge and signed off by board of AOT.

จึงเรียนมาเพื่อพิจารณา หากเห็นชอบกรุณาสั่งการตามข้อ 4 ให้ต่อไปด้วย

เพื่อกรถถลังกรใน้ต่อไปตั้งบ

ผอก.สกอณ. 21 n.n.cc

26 July 2023

ขอญ, ชอญ, ลขบ., พอก.สนกฮ., พอก.สหกส., พอก.สนาก และ พอก.สนาก กราน

- ส่วนราน mon. อาณข้อ 3,1.1 และ 3,1.2 ดำเนินการในผู้จนที่เกิบจบ้องอานบ้อ 4.1

- ฝปก และ ฝรส ดำเนินกรชาวเก้ 4.2 ແລະ 4.3 ຫານຄຳຄັນ

ส่วนงาน ทอกให้การสนับสนุนตามข้อ 4.4

President's signature

(Executive Director)

26 July 2023



## **Impact 1: Customer Satisfaction**

Cause of Impact: The impact derived from the product/service of AOT, and AOT's operation across all airport of AOT that is covered >50% of business activity External stakeholder(s)/ Impact area(s) evaluated: Social and Customer/ End-Users aspects

Topic relevance on external stakeholders: The customer satisfaction survey of AOT has been conducted annually to verify the quality of product and service provided by AOT, especially service from AOT's operation that directly impact to customer satisfaction. Several services of AOT cannot recover so quickly from the pandemic and continuously impact the overall quality of AOT's business. However, the overall situation is gradually becoming better and is affecting the recovery of revenue for AOT's stakeholder by an increase of passenger that can bring the liquidity to the stakeholder in parallel, especially airline. This can be verified by an increase of flights of total airline (AOT's customer) which was increased by 62.22%, consisting of 321,053 international flights and 318,838 domestic flights.

Area of Impact	Impact 1	Impact 2		
Type of Impact	Positive	Positive		
Output Valuation	Increased total passenger: 100,058,695	Increased total passenger: 100,058,695		
Output Metric	Total population of the area served	Total population of the area served		
Impact Valuation	Access to product/service with positive impact provided	Access to product/service with positive impact provided		
Impact Metric	Total flight increased for airline	Customer Satisfaction Score (ASQ)		
Impact Valuation Result	Flights increased: 639,891	ASQ score: 4.17		
Reference	IRIS, 2021. Service Area Population (Pl6686). v5.2.	IRIS, 2021. Producer Price Premium (PI1568). v5.2.		



## **Impact 2: Airport Safety and Security**

Cause of Impact: The impact derived from the business operation, and AOT's supplier across all airport of AOT that is covered >50% of business activity External stakeholder(s)/ Impact area(s) evaluated: Environmental, Social, and consumer/ end-users aspects

**Topic relevance on external stakeholders:** Regarding the operation of AOT, the infrastructure service, safety and security are the crucial aspects which have prioritized to be important for the customer, any users, or passengers. This material issue related to the airport operation is required to comply with the international standard, e.g., ICAO, to ensure the overall zero unforeseen incidence that can happen to customer, business partner, supplier, etc. These are the external stakeholders of AOT. Preventing any losses by securing and complying with the standard can also prevent the illnesses, injuries, fatalities, lost workday, and revenue loss.

Area of Impact	Impact 1
Type of Impact	Positive
Output Valuation	0 fatality case
Output Metric	Number of fatalities
Impact Valuation	Quantified quality of life impacted
Impact Valuation Result	0 THB
Impact Metric	Avoided Income loss from fatality case
Reference	IRIS, 2021. Occupational Illnesses (OI7060). v5.2.