

The Role of Management Information Systems in the Aviation Industry on the Batik Air App

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Abstract. This study discusses the role of management information systems (MIS) in the aviation industry on the Batik Air application. In the aviation industry, MIS plays an important role in improving efficiency and service quality. Batik Air, as one of Indonesia's domestic airlines, has a need to improve service quality and increase passenger satisfaction. In this study, researchers used a qualitative research method with a literature study approach to analyze the role of management information systems (MIS) in the aviation industry on the Batik Air application. The results of the study show that it is very important to have a useful MIS in the modern era like today, because of the increasingly tight competition. If we have a MIS in online flight services, Batik Air supports people in their daily lives, especially for purchasing tickets via the internet. By using the Batik Air Mobile App, ordering tickets online has many advantages, but also has disadvantages.

Keywords: Aviation Industry, Management Information System, Batik Air App.

BACKGROUND

If they want to survive in the current era of global competition and increasingly fierce competition, every company must be able to do new things. One way to do this is by using appropriate technology. Information systems are the tools that companies most often use to achieve their goals (Faeni et al., 2023).

Various technological advances can be easily integrated into our daily lives (Faeni, 2024). The first is to have access to the internet. In short, traditional ticket sales methods have evolved into a more contemporary approach commonly called online sales. Due to the widespread use of online shopping, ticket reservations can now be done via a computer connected to the internet.

Transportation companies, especially air transportation companies such as Batik Air, also carry out e-ticketing. Public dissatisfaction and the need for air transportation services forced Batik Air to provide services, one of which is the availability of E-ticketing. Apart from offering convenience for the general public, e-ticketing also has several disadvantages (Valencia & Sudibyo, 2021).

Based on the background that has been described, the problem formulation is taken as follows:

- 1. What is an explanation of Management Information Systems?
- 2. What is an explanation of E- ticketing?
- 3. What are the benefits, advantages and disadvantages of Batik Air E- ticketing?

THEORETICAL STUDY

Management Information System

Information management systems (MIS) are one part of internal business processes. SIM handles business issues such as product pricing, service costs, or business strategy using human resources, documentation, technology, and administrative procedures. SIM is different from ordinary systems which are used to complement other information systems related to business operations (Kusumaningrum, 2019).

According to academics, this function is usually applied to groups of information management techniques related to prevention and mitigation human decision making, such as information processing systems, decision support systems, and expert systems . Overall, Management information systems are defined as subsystems comprehensive, well-organized radiology that can convert data into information that can be used in various ways to increase productivity according to established measurements of the length of the human day (Zakiyah et al., 2022).

Simply put, MIS is part of a computer-based information system that provides the needs of some users. Users often consist of formal organizations, businesses, or subunits within them. Information provides clear information to any business or system regarding what happened in the past, what is happening now, and what may happen in the near future. This data is available in the form of graphs, statistics, and output models. In business, managers and non-managers use output information when they need to gather information to solve problems or make decisions.

Management information system is to meet the general information needs of all managers in the company or within the company's organizational unit (Faeni, 2024). SIM provides information to users such as output and reports from various mathematical simulation models.

Aviation Industry

The aviation industry is a complex and dynamic industry. Airlines have to deal with various stakeholders, such as passengers, travel agents, airports and regulators. Airlines also

have to face various challenges, such as intense competition, fluctuating fuel prices, and unpredictable weather conditions (Utama, 2021).

The aviation industry has a significant impact on the global economy. This industry creates millions of jobs and generates trillions of dollars in revenue every year. The aviation industry also plays an important role in connecting people and places around the world, and facilitating international trade and tourism (Satria et al., 2020).

RESEARCH METHODS

This research will use a qualitative approach with a single case study method. A qualitative approach was chosen because it was possible for researchers to understand in depth the role of Management Information Systems (MIS) in the aviation industry in the Batik Air application. The data collection techniques that will be used in this research are observation and analysis of documents in the form of news articles and journals about SIM in the aviation industry.

RESULTS AND DISCUSSION

Utilization of SIM in the Aviation Industry in the Batik Air Application

E-ticketing, also known as electronic ticketing, is a method of documenting the sales process of a customer's actual journey without the need to provide a written contract in the form of a paper ticket. All information regarding electronic tickets is stored digitally in the airline's computer system. As a thank you for purchasing an E-Ticket, the buyer will receive an Itinerary The receipt functions as a travel guide to Indonesia, essentially reminding passengers to bring their travel documents (Firmansyah & Sari, 2023)

E-ticketing offers the opportunity to reduce costs and maximize user convenience. Electronic tickets reduce ticketing costs, eliminate the need for paper tickets, and increase the flexibility of travel agents and tour guides in making itinerary changes. This e-ticketing system makes it easier for the general public to buy tickets for various events on one website. This can be used to purchase tickets using cash or a credit/debit card account. In addition, this e-ticketing system can reduce the risk of flight delays, cancellations or missed flights.

One of the main banking companies operating in Indonesia is Batik Air. Please note that this airline is Lion Air, which has been missing since the summer of 2013. As time goes by, there are more opportunities for growth and comfort that can be enjoyed by every consumer. As a result of Batik Air's expansion, new services are now available, such as self-check-in (self-reporting) before departure via the Batik Air mobile application (Lianto, 2019).

Batik Air App Features

- Users can see flight schedules wherever and whenever they want, users can even see the price of the flight they want to choose and they can also directly choose the airplane seat number they want.
- The Manage Booking feature functions to find out the airport code for your destination and also upcoming flights. This feature can also be used if you want to know the orders you have made.
- 3. In the Check-in feature, you can check -in online 24 hours before the flight, usually by checking in at the beginning of the time you can choose the flight seat you want. You also don't have to queue for a seat and get boarding pass, apart from that, the online check- in feature can reduce the risk of missing your flight.
- 4. There are six flight statuses that can be monitored via the flight status feature, namely scheduled, final call, In Air, Laanded, Delayed and Canceled . All flight statuses in the Flight Status feature on the Batik Air App can also be shared whoever you want. The "Flight Status" feature can only be seen or opened if you have a plane ticket/flight schedule. If you do not have a flight ticket, then this feature cannot be accessed.
- 5. Up dialog box display will appear after you click the "book flight" feature. In this display you can choose where and where your flight will go. In this display you can also choose your departure date according to what you want, you can also choose the seat class you want, such as Economy class, Business class, or First Class.
- 6. Next, after you determine your flight destination, the next pop-up dialog box display will appear. With this feature you can see the price and estimated time of your flight. There is a display of the flight departure time and the time the plane will land at your destination airport. You can choose the flight hours according to your wishes, there are also price details for each flight class that you can choose.
- 7. After making an order, consumers can also immediately choose the seat they want to sit on the plane or you can also skip this stage. If you don't choose your own airplane seat, you will get a random seat from the airline. However, if you want to choose the seat you want, you will be charged IDR 20,000.
- Next, the feature display will appear flights summary that shows details of your order. These price details are what you will have to pay, so that you can immediately get your flight ticket.

- 9. Usually there is a time period to make payment, so it is recommended that you make payment as soon as possible if you have ordered a ticket, otherwise your ticket will be canceled automatically.
- 10. Your flight will take to reach your destination city/airport, "Direct 1h 50m" which means you will take your flight in around 1 hour 50 minutes.
- 11. You can easily create and select the "Check -in" feature from the online check -in menu available in this application. After that, you can enter the booking reference number or PNR on the ticket you have purchased. Usually the booking code contains several nominal numbers. Apart from that, you must reveal the name of the person who wants to make the flight. Afterwards, consumers will also find out information about goods that meet quality standards and comply with strict quality control guidelines, as well as a guide to choosing built-in charcoal that fits a particular category. Then click "Continue/ Continue" then proceed to the Check -In process by selecting the flight and orderer's name according to what is listed on the ticket you already have, then put a check mark in the column provided. The check-in process using the pub application is complete.
- 12. After checking in online, then boarding pass you will appear. A boarding pass is a document that gives access to the aircraft provided by the airline to passengers who have completed the arrival confirmation process (check -in). Boarding Passes can be obtained after we complete the lengthy manual check -in process at each counter, whether done online or face to face. Next we will check boarding pass which usually contains your name, gate number, boarding time , lane number, and other information. Regarding domestic and international travel, it is recommended that you check-in 90 minutes before the departure date.
- 13. The "Manage Orders" feature is very useful for Batik Air app users. With this feature, users can see upcoming flight schedules or their next flights. Users can also see their previous/past orders in this feature (Mafrudoh et al., 2017).

Benefits of Batik Air App

With the Batik Air application, ordering tickets and check-in becomes easier. There are many benefits that we can get from this application. Convenience is the main advantage of booking plane tickets online . You can plan your vacation any time via the internet. Whether day or night, at work or while sleeping. You can book your next trip directly while you're on the road (Hidayat & Basit, 2018).

Apart from being able to be booked anywhere, there are many routes you can choose from when ordering plane tickets online . Not only can you choose the route, but you can also freely choose the destination, airport, airline and departure schedule. The features are easy to use and buying plane tickets online is even easier (Ananta & Albanna, 2023).

You can compare prices directly and choose the best one. To get help with the process, you don't need to contact customer service. You can do this at any time as long as you have an internet connection (Widjaja, 2017).

With the Batik Air App, canceling or changing schedules online is easier. To get help with the process, you don't need to contact customer service. You can do this at any time as long as you have an internet connection (Sudana, 2007).

Batik Air App Constraints

- 1. Sometimes some users have difficulty receiving emails after they have registered online
- 2. The purchase of e-tickets will be done online , namely via the web, and many people do not have enough understanding of the internet, which means they cannot use it.
- 3. There are concerns about the security of credit card codes.

CONCLUSIONS AND RECOMMENDATIONS

Very important for having a driver's license is useful in the modern era like moment this, because the more strictly competition. If we have a driver's license at the service online flights, Batik Air supports insiders' life everyday life, especially for purchase tickets via internet. With using the Batik Air Mobile App, order online tickets have Lots profit, but also a lot the drawback.

For increase performance Batik Air application and respond complaint users, as well for ensure that every social media Batik Air airline must own two- way communication, so customer can get answer when they ask about flight. Expected with increase interaction customers, here will teach What about Batik Air customers? use service flight with Good.

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