



Proceeding – ICOBIS

INTERNATIONAL CONFERENCE ON GLOBAL INNOVATION AND TRENDS IN ECONOMICS  
(ICOBIS)

## Online Advertising, Tourist Facilities, And Tourist Satisfaction: An Empirical Study On Sunyaragi Cave Tourist Attraction, Cirebon, West Java

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**Abstract**—The development of digital technology has driven shifts in tourist destination marketing strategies through the use of online advertising, while the provision of adequate tourist facilities remains a critical factor in creating a satisfying experience for visitors. Sunyaragi Cave Tourist Attraction in Cirebon, as one of the leading cultural tourism destinations in West Java Province, needs to optimize both aspects to enhance tourist satisfaction. This study aims to analyze the influence of online advertising and tourist facilities on tourist satisfaction, both partially and simultaneously. A quantitative approach with a survey method was employed. Data were collected by distributing questionnaires to 100 tourists who had visited Sunyaragi Cave Tourist Attraction Cirebon. A purposive sampling technique was used, while data analysis was conducted using multiple linear regression via SPSS version 25. The results showed that online advertising had a positive and significant effect on tourist satisfaction with a  $t$ -count of 5.164 >  $t$ -table of 1.984 and a coefficient of determination of 20.6%. Tourist facilities also had a positive and significant effect on tourist satisfaction with a  $t$ -count of 6.426 >  $t$ -table of 1.984 and a coefficient of determination of 28.9%. Simultaneously, online advertising and tourist facilities significantly influenced tourist satisfaction with an  $F$ -count of 33.670 >  $F$ -table of 3.09 and a significance value of  $0.000 < 0.05$ . Both variables accounted for 39.8% of the variance in tourist satisfaction, while the remaining 60.2% was influenced by other factors outside the research model. These findings indicate that enhancing digital promotional effectiveness supported by high-quality tourist facilities is a crucial strategy for increasing tourist satisfaction and strengthening the competitiveness of cultural tourism destinations in Cirebon.

**Keywords**— *online advertising; tourist facilities; tourist satisfaction; Sunyaragi Cave; tourism*

### I. INTRODUCTION

West Java Province is one of Indonesia's premier tourism destinations, featuring diverse natural, cultural, historical, religious, and creative economy attractions. Among these, Sunyaragi Cave Tourist Attraction in Cirebon stands out as a cultural tourism destination with rich historical significance, originating from the Cirebon Sultanate and serving as a cultural icon in West Java. Its unique architectural design—dominated by coral rock formations—strong historical value, and regular cultural events make Sunyaragi Cave an attractive destination for both domestic and international tourists. However, intensifying competition among tourism destinations requires managers to continuously enhance digital promotional strategies and service quality to maintain a competitive edge. The rapid growth of the internet has shifted tourist information search behavior from traditional channels to digital platforms. Prior to traveling, visitors tend to gather information via search engines, official websites, social media, promotional videos, and user reviews on digital channels. Consequently, online advertising has become an essential marketing instrument for building destination image, establishing prospective visitor trust, and influencing travel decisions. Effective online advertising is characterized by accurate information, engaging content, ease of access, and interactive communication, which together form positive expectations toward the destination.

On the other hand, successful digital promotion must be supported by adequate physical tourist facilities. Tourist facilities represent service components directly experienced by visitors upon arrival. The availability of parking areas, clean restrooms, worship facilities, information centers, accessibility features, culinary options, rest areas, security, and environmental cleanliness directly impacts visitor comfort and overall experience quality. When on-site facilities align with information presented in digital media, tourists are highly likely to feel satisfied. Conversely, discrepancies between promotional content and actual field conditions can significantly diminish tourist satisfaction. Tourist satisfaction serves as a primary indicator of successful destination management. Satisfaction occurs when the actual experience meets or exceeds expectations established prior to the trip. Satisfied tourists are more inclined to revisit (revisit intention), spread positive word-of-mouth recommendations, and share positive experiences on social media, ultimately strengthening destination image and competitiveness.

Previous studies indicate that both online advertising and tourist facilities share positive relationships with tourist satisfaction. Research by Chang and Wang (2019) demonstrated that digital information and online advertising shape tourist expectations and influence post-visit satisfaction levels. Other studies have highlighted facility quality and the physical environment as critical determinants of visitor experience and satisfaction. However, most prior research examined these variables separately or focused primarily on natural attractions, hotels, or restaurants. Studies integrating online advertising

and physical facility quality within cultural heritage destinations – specifically Sunyaragi Cave Cirebon – remain relatively limited.

Therefore, a research gap exists regarding empirical tests that simultaneously analyze the impact of online advertising and tourist facilities on visitor satisfaction within Indonesian cultural heritage destinations. Furthermore, Sunyaragi Cave's unique historical and architectural characteristics require tailored empirical evidence to understand specific drivers of visitor satisfaction. This study aims to analyze the partial and simultaneous effects of online advertising and tourist facilities on tourist satisfaction at Sunyaragi Cave Tourist Attraction Cirebon. The findings are expected to contribute theoretically to digital marketing and destination management literature, as well as offer practical

recommendations for destination managers and local government agencies in formulating integrated promotional and facility management strategies.

### Conceptual Framework

This research utilizes two independent variables, Online Advertising ( $X_1$ ) and Tourist Facilities ( $X_2$ ), and one dependent variable, Tourist Satisfaction ( $Y$ ). Online advertising is conceptualized as a marketing communication strategy that builds expectations and influences travel decisions through engaging, accessible, and credible information. Tourist facilities represent physical service quality that directly affects visitor comfort and on-site experience. Both variables are hypothesized to contribute positively to tourist satisfaction, both individually and combined.

### Research Hypotheses

Based on theoretical foundations and prior empirical literature, the following research hypotheses were formulated:

H1: Online Advertising has a positive and significant effect on Tourist Satisfaction at Sunyaragi Cave Tourist Attraction Cirebon.

H2: Tourist Facilities have a positive and significant effect on Tourist Satisfaction at Sunyaragi Cave Tourist Attraction Cirebon.

H3: Online Advertising and Tourist Facilities simultaneously have a positive and significant effect on Tourist Satisfaction at Sunyaragi Cave Tourist Attraction Cirebon.

## II. METHOD

This study adopted a quantitative approach using a survey method. A quantitative approach was selected to test causal relationships among Online Advertising ( $X_1$ ), Tourist Facilities ( $X_2$ ), and Tourist Satisfaction ( $Y$ ) via statistical analysis. Survey questionnaires were distributed directly to visitors who had completed their visit to Sunyaragi Cave Tourist Attraction in Cirebon City, West Java Province.

The study population comprised all tourists visiting Sunyaragi Cave during the research period. Purposive sampling was used to select 100 respondents based on specific criteria: (1) aged 17 years or older; (2) had visited Sunyaragi Cave Tourist Attraction; (3) had previously accessed digital information regarding Sunyaragi Cave (via websites, Instagram, Facebook, TikTok, YouTube, Google, or other digital outlets); and (4) were willing to complete the questionnaire.

Data collection included primary data (questionnaires administered on-site and observational field insights) and secondary data (academic journals, industry reports, and official documentation). Variable operationalization was defined as follows:

- Online Advertising ( $X_1$ ): Promotional activities via digital media aiming to inform and attract visitors. Indicators include information discoverability, visual/content attractiveness, completeness and accuracy, promotional frequency, information credibility, and ease of digital access.
- Tourist Facilities ( $X_2$ ): Supporting physical infrastructure and amenities provided by destination managers. Indicators include facility cleanliness, parking space availability, clean restrooms, worship areas, information center, rest areas, security, and accessibility.
- Tourist Satisfaction ( $Y$ ): Overall psychological state comparing pre-visit expectations with actual experiences. Indicators include overall satisfaction, expectation alignment, revisit intention, and willingness to recommend to others.

All items were measured using a 5-point Likert Scale ranging from 1 (Strongly Disagree) to 5 (Strongly Agree). Data were analyzed using IBM SPSS Statistics Version 25, comprising descriptive statistics, Pearson product-moment validity tests, Cronbach's Alpha reliability tests ( $\geq 0.70$  threshold), classical assumption tests (normality, multicollinearity, heteroscedasticity), multiple linear regression, t-tests, F-tests, and coefficient of determination analysis ( $R^2$ ).

$$\text{Multiple Linear Regression Model: } Y = \alpha + \beta_1 X_1 + \beta_2 X_2 + \varepsilon$$

$Y$  = Tourist Satisfaction;  $\alpha$  = Constant;  $\beta_1, \beta_2$  = Regression Coefficients;  $X_1$  = Online Advertising;  $X_2$  = Tourist Facilities;  $\varepsilon$  = Error term.

## III. RESULTS AND DISCUSSION

### Respondent Demographics

The statistical profile indicated that the majority of respondents were between 21 and 35 years old, predominantly female, and primarily sourced information regarding Sunyaragi Cave through Instagram, TikTok, YouTube, and Google search.

**5.164**  
ONLINE ADVERTISING T-COUNT  
(T-TABLE = 1.984)

**6.426**  
TOURIST FACILITIES T-COUNT  
(T-TABLE = 1.984)

**33.670**  
SIMULTANEOUS F-COUNT  
(F-TABLE = 3.09)

### Effect of Online Advertising on Tourist Satisfaction

Partial hypothesis testing (t-test) yielded a calculated t-value of 5.164, exceeding the table value of 1.984 (tcount 5.164 > ttable 1.984) with a significance value < 0.05. Thus, H1 is accepted. The coefficient of determination ( $r^2$ ) for online advertising stood at 20.6%. Digital channels effectively raise visitor interest by offering prompt information, appealing visual graphics, user reviews, video clips, and easy access to ticket prices, schedule details, and site features. High-quality digital promotion directly enhances tourist satisfaction prior to and during visits.

### Effect of Tourist Facilities on Tourist Satisfaction

Partial testing for tourist facilities produced a calculated t-value of 6.426, significantly higher than the critical threshold (tcount 6.426 > ttable 1.984,  $p < 0.05$ ). Therefore, H2 is accepted. The partial coefficient of determination reached 28.9%, leaving 71.1% explained by unmeasured factors (service quality, ticket price, destination image, etc.). Complete, comfortable amenities—such as well-maintained restrooms, spacious parking, clean prayer rooms, readable signage, rest zones, and safety protocols—directly boost physical comfort and elevate the overall visitor experience.

### Simultaneous Effect of Online Advertising and Tourist Facilities

Simultaneous hypothesis testing (F-test) yielded an F-value of 33.670, surpassing the critical table value (Fcount 33.670 > Ftable 3.09) with  $p = 0.000 < 0.05$ . Consequently, H3 is accepted. The Adjusted R<sup>2</sup> was 0.398, indicating that combined online advertising and facility quality account for 39.8% of the variance in tourist satisfaction, while the remaining 60.2% is determined by exogenous variables.

TABLE I. HYPOTHESIS TEST RESULTS

| Hypothesis | Variables & Model Path                         | Test Statistic | Table Value | Sig.  | Result    |
|------------|------------------------------------------------|----------------|-------------|-------|-----------|
| H1         | Online Advertising → Tourist Satisfaction      | t = 5.164      | 1.984       | 0.000 | Supported |
| H2         | Tourist Facilities → Tourist Satisfaction      | t = 6.426      | 1.984       | 0.000 | Supported |
| H3         | Online Advertising + Facilities → Satisfaction | F = 33.670     | 3.090       | 0.000 | Supported |

These results affirm that digital promotion creates visitor expectations, whereas actual physical facilities determine baseline satisfaction upon arrival. Aligning online representations with physical realities creates optimal visitor satisfaction and fosters positive word-of-mouth.

## IV. CONCLUSIONS

Based on the results of the simultaneous hypothesis test, advertising and tourism facilities were found to have a significant effect on tourist satisfaction, as indicated by a significance value (Sig.) of 0.000, which is lower than 0.05 ( $0.000 < 0.05$ ), and an F-value greater than the F-table value ( $33.670 > 3.09$ ). These findings indicate that advertising and tourism facilities simultaneously have a significant influence on tourist satisfaction. This result suggests that the more intensive the advertising efforts carried out by Goa Sunyaragi Tourism, the higher the level of tourist satisfaction. Likewise, the more complete and adequate the supporting tourism facilities provided by Goa Sunyaragi, the greater the satisfaction experienced by visitors. High levels of tourist satisfaction are expected to encourage visitor loyalty toward the destination. Furthermore, the Adjusted R Square (R<sup>2</sup>) value of 0.398 indicates that the advertising and tourism facilities variables collectively explain 39.8% of the variation in tourist satisfaction at Goa Sunyaragi Tourism, Cirebon. The remaining 60.2% is explained by other factors that were not included in the research model.

### Practical Implications

Advertising for Sunyaragi Cave tourism in Cirebon is already fairly good, but it would be better to expand the reach of the information through various existing media rather than focusing only on the Cirebon area and its surroundings. Judging from the results of the advertising statements, the highest average score is found in print media advertising, such as posters and brochures. However, statements with relatively low scores—which fall below the average—should be improved, such as electronic media that has not been utilized optimally. Therefore, it is recommended that the management of Sunyaragi Cave tourism in Cirebon expand and make more optimal use of electronic media, so that tourists feel more satisfied with receiving accurate information and having positive expectations toward Sunyaragi Cave tourism.

Tourism facilities at Sunyaragi Cave in Cirebon are also quite good, similar to the advertising aspect, but it would be advisable to enhance them further. Based on the results of the tourism facilities statements, the highest average scores that should be maintained relate to parking spaces, clean water installations, nearby hospitals or health centers, and service quality. However, statements with relatively low scores that fall below the average must be improved, such as the lack of security, travel agents, and dedicated tourist transportation at Sunyaragi Cave. Therefore, it is recommended that the management of Sunyaragi Cave tourism in Cirebon provide a stronger sense of security, travel agency services, and special transportation for tourists so that visitors feel more satisfied when using the tourism facilities at Sunyaragi Cave.

The level of tourist satisfaction perceived by visitors to Sunyaragi Cave in Cirebon is fairly good, but it would be beneficial to improve it even further. Judging from the results of the tourist satisfaction statements, the highest average scores that deserve to be maintained pertain to high-quality products, excellent service levels, building relationships with tourists, creating loyalty, prioritizing tourists as the most valuable asset, showing care toward tourists, well-functioning goods and services at Sunyaragi Cave, service quality assurance, customer trust, and organized resource support. However, statements with relatively low scores that fall below the average must be addressed, such as the lack of discounts and vouchers, as well as the difficulty in contacting the tourism management. Therefore, it is recommended that the management get closer to customers by offering discounts or vouchers and making it easier for tourists to reach the management, so that visitors feel more satisfied and even become loyal to Sunyaragi Cave tourism.

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