

## Al-Biruni's Historical Method (973 M-1048 M) in Kitab Tarikh Al-Hind

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### Abstrak

Abu al-Rayḥan Muḥammad ibn Aḥmad al-Biruni (973 M-1048 M) dikenal sebagai ilmuwan multidisipliner yang menerapkan observasi langsung, verifikasi, dan analisis kritis dalam penulisan sejarah. Penelitian ini mengkaji kontribusi al-Biruni dalam historiografi Islam melalui analisis karya monumentalnya, Kitab tarikh al-hind, yang memuat kajian mendalam mengenai agama, filsafat, budaya, ilmu pengetahuan, geografi, dan kehidupan sosial masyarakat India. Metode historis yang digunakan dalam penelitian ini terdiri dari lima langkah utama, yakni pemilihan topik, heuristik (pengumpulan sumber primer dan sekunder), kritik sumber, interpretasi, dan penulisan sejarah. Pendekatan ini dipadukan dengan metode deskriptif-komparatif untuk menggambarkan serta membandingkan metode historiografi al-Biruni dengan standar historiografi modern. Hasil penelitian menunjukkan bahwa al-Biruni menerapkan berbagai ilmu bantu seperti ilmu sosial, budaya, astronomi, matematika, dan linguistik dalam membangun rekonstruksi sejarah yang akurat dan objektif. Pendekatan yang menggabungkan sumber tertulis, lisan, dan observasi lapangan mencerminkan konsep triangulasi data yang kini menjadi standar dalam penelitian ilmiah. Dengan demikian, Kitab tarikh al-hind tidak hanya mengandalkan tradisi naratif, tetapi juga bukti empiris, menjadikannya karya historiografi ilmiah yang unggul dan relevan hingga saat ini.

**Kata kunci:** al-biruni, historiografi islam, kitab tarikh al-hind.

### Abstract

*Abu al-Rayḥan Muḥammad ibn Aḥmad al-Biruni (973 M-1048 M) is known as a multidisciplinary scholar who applied direct observation, verification, and critical analysis in writing history. This research examines al-Biruni's contribution to Islamic historiography through an analysis of his monumental work, Kitab tarikh al-hind, which contains in-depth studies of religion, philosophy, culture, science, geography, and the social life of Indian society. The historical method used in this research consists of five main steps, namely topic selection, heuristics (collection of primary and secondary sources), source criticism, interpretation, and historical writing. This approach is combined with the descriptive-comparative method to describe and compare al-Biruni's historiography method with modern historiography standards. The results show that al-Biruni applied various auxiliary sciences such as social science, culture, astronomy, mathematics, and linguistics in building an accurate and objective historical reconstruction. The approach of combining written, oral, and field observation sources reflects the concept of data triangulation that is now standard in scientific research. As such, the Kitab tarikh al-hind relies not only on narrative tradition, but also empirical evidence, making it an excellent work of scholarly historiography that is relevant today.*

**Keywords:** al-biruni, historiografi islam, kitab tarikh al-hind.

### INTRODUCTION

During the Golden Age of Islam, which lasted from the 8th to the 13th century CE, Islamic civilization reached the pinnacle of progress in various fields of knowledge, including historiography. This

period was characterized by a high spirit of scholarship, scientific institutions such as Bayt al-Ḥikmah in Baghdad, and the emergence of Muslim scientists and scholars who played a major role in the development of world science. One of

their most important contributions was in the field of history, where writing was no longer merely narrative and chronological, but began to employ scientific, rational, and critical approaches (Kohar, 2018). Islamic historiography during this period did not only aim to document events, but also to seek meaning, patterns, and causes and effects of those events.

A prominent figure emerged in the form of Abū al-Rayḥān al-Biruni (973-1048 CE), a Muslim polymath from Khwarizm who was known for his mastery of various disciplines. He wrote more than 100 works in the fields of history, geography, astronomy, mathematics, mineralogy, pharmacy, and philosophy. Al-Biruni's strength lay in his ability to integrate scientific approaches with rational principles in all his research. In the field of historiography, al-Biruni demonstrated a systematic and objective approach, seeking historical truth through fact verification, source criticism, and the use of empirical and comparative approaches (Kohar, 2018; Nur, 2023).

His encyclopedic work *Kitab tarikh al-hind* is a clear example of his contributions, written based on his direct experiences in India. This book is a scientific record that discusses various aspects of Indian society, including religion, culture, science, philosophy, and social structure. The full title of the book is *Kitab fi Taḥqiq ma li'l-Hind min Maqulah Maqbulah fī al-'Aql aw Mardhulah*, which

means "Book of Investigation into What Belongs to the Indian People: from Statements Acceptable to Reason or Rejected." In this book, al-Biruni avoids subjective judgments and strives to present information in a neutral and scientific manner based on observations and interviews with local residents (Ghulam et al., 2024).

The strength of al-Biruni's approach in *Tārīkh al-Hind* lies in his sincerity in understanding foreign cultures. He studied Sanskrit in depth so that he could read and translate original texts, and compare Indian teachings with Greek and Islamic philosophy. His cross-cultural and cross-religious approach shows that he sought not only to understand events, but also the philosophical and theological context behind them (Rahim & Alias, 2021). In this regard, al-Biruni emphasized the importance of empathy and understanding in historical studies, an approach that preceded modern anthropological methods. Contemporary historians consider this method to be the precursor of comparative historiography, which emphasizes cultural equality (Adnan, 2014).

The historiographical method developed by al-Biruni includes important elements that are now considered the foundations of scientific history: data collection through direct observation, criticism of the reliability of sources, and cross-cultural comparison. He did not

accept all information as fact, but filtered it through a skeptical and rational approach. In some ways, his approach resembles the modern methods developed centuries later by European historians such as Leopold von Ranke, who also emphasized the importance of primary sources and objectivity (Munir, 2015; Sirajulhuda, 2019). Thus, al-Biruni is not only part of the Islamic tradition but also contributed to the global heritage of historiography.

Research on al-Biruni's historical methods has been conducted by several scholars, including Iqbal (2007), who highlighted al-Biruni's scientific and observational approach in studying foreign cultures and civilizations, including India, using a structured empirical method. Meanwhile, rdi, Abdullah, & Tamimi (2016) underscore al-Biruni's objectivity in describing Indian society based on direct interaction and comparison of sources, reflecting a scientific and tolerant attitude. Both studies emphasize al-Biruni's precision and objectivity in writing history, but differ in scope: Iqbal views it from the perspective of scientific methods in general, while Rizqa focuses more on the narrative in *Kitāb Tā'rikh al-Hind*. The novelty of this research lies in its attempt to systematically analyze al-Biruni's historiographical method in *Kitab Ta'rikh al-Hind* by comparing it with modern historiographical principles, thus showing that al-Biruni was not only a cultural

observer but also a pioneer of critical historical methods that transcended his time.

Research on al-Biruni's methods and thoughts is important in order to re-examine the intellectual roots of Islamic historiography and its role in the development of world science. Through the study of al-Biruni's works, we can understand that the scientific tradition in the Islamic world is very deep and complex, and has made a significant contribution to the scientific methodology later adopted by the Western world. This research also reinforces the narrative that science did not develop linearly from Greece to modern Europe, but involved major contributions from Islamic civilization (Das et al., 2022; Munir, 2015; Stoneman, 2021)

This research aims to examine al-Biruni's historiographical methods, particularly as applied in *Kitab tarikh al-hind* and other works. This study will focus on the empirical approach, source criticism, and comparative methods used by al-Biruni in his efforts to understand historical events objectively and rationally. This research will also discuss the relevance of al-Biruni's approach in the context of contemporary historical studies and how his contributions can be used as a model for fair and cross-cultural historical writing (Armi et al., 2022).

An analysis of al-Biruni's historiographical approach and thinking is

expected to provide a deeper understanding of how Islamic tradition laid the important foundations for scientific historical writing. Al-Biruni's works show that scholarship in Islam is integrative, combining reason, cultural empathy, and systematic methods. This constitutes a valuable legacy in building a historiographical tradition that not only prioritizes factual truth but also upholds inter-civilizational understanding. Thus, al-Biruni can be regarded as a pioneer in shaping a global and humanistic framework for history.

## **METHODS**

This study uses a historical approach combined with descriptive-comparative methods to analyze al-Biruni's contribution to Islamic historiography through his monumental work, *Kitab tarikh al-hind* (Ahmad, 2010). The historical method applied in this study refers to five main steps, namely: topic selection, heuristics (source collection), verification or source criticism, interpretation, and historical writing (historiography). Topic selection was carried out explicitly by focusing on al-Biruni's scientific methods and contributions. Heuristics are reflected in the collection of data from primary sources in the form of *Kitab tarikh al-hind* translated by E. C. Sachau, as well as secondary sources from relevant academic literature. Verification or source criticism is evident in the emphasis on the use of

authentic and verified sources, in line with the principles of historical research (Karyanta et al., 2020). Interpretation is carried out by examining how al-Biruni combines oral sources, written texts, and personal observations in constructing an objective historical narrative. Meanwhile, the final stage of historical writing is presented in the form of a scientific narrative that evaluates al-Biruni's methods in the context of Islamic historiography.

Additionally, a descriptive-comparative approach is employed to strengthen the analysis, particularly in comparing the cultural and religious aspects of India studied by al-Biruni with Islamic and Greek traditions. This approach is crucial for assessing the extent to which al-Biruni's historiographical methods are analytical, critical, and scientific without bias (Hartono, 2019). The analysis technique was carried out through an in-depth literature review of al-Biruni's works and various academic literature, including articles from the journal *Kemanusiaan* by Rahim & Alias (2021) discussing the moral approach in his historiography, as well as the journal *International Journal of Nusantara Islam* by Ardi, Abdullah, & Al-Tamimi (2016) highlighting his critical thinking. With this combined approach, the research not only describes and compares al-Biruni's methods with contemporary historiographical standards

but also examines their relevance and contributions to the formation of modern scientific historiography (Sugiyono, 2017).

## RESULTS AND DISCUSSION

Abu al-Rayḥan Muḥammad ibn Aḥmad al-Biruni was born on September 4, 973 CE in Kath, the capital of Khwarazm (now part of Uzbekistan). The name “al-Biruni” comes from the word “bīrūn,” which means “outskirts of the city,” referring to his birthplace on the outskirts of Kath. From a young age, al-Biruni showed a keen interest in science. He studied under the guidance of prominent scientists such as Abu Nasr Mansur, who taught him Euclidean geometry and Ptolemaic astronomy. The influence of Greek philosophers such as Aristotle, Archimedes, and Democritus also shaped his thinking. At the age of 17, al-Biruni began conducting astronomical observations and calculating the latitude and longitude of his hometown. His linguistic abilities, which included Arabic, Persian, Greek, and Sanskrit, enabled al-Biruni to access various scientific literature of his time (Ahmad, 2010).

Al-Biruni was a great scientist of the Islamic world in the 11th century with an extraordinary range of knowledge, from astronomy, mathematics, geography, pharmacy, to philosophy and history. According to Britannica, he is known for his extraordinary scientific methods, including the use of experiments, direct

observation, and an analytical approach to historical and scientific data. During his lifetime, he produced more than 100 written works, although only a small fraction of these are still available today.

One of the most notable aspects of Al-Biruni's life was his ability to integrate knowledge from various civilizations, particularly India, Persia, Greece, and Islam. Britannica notes that during his travels to India with the Ghaznavid ruler Mahmud of Ghazni, Al-Biruni learned Sanskrit, translated Indian scientific texts, and compiled the *Kitāb al-Hind*, a multidisciplinary work on Indian philosophy, religion, and science.

Al-Biruni is widely known for his contributions to astronomy and mathematics. He developed methods for determining geographical latitude and longitude and calculated the radius of the Earth with high accuracy (Report & Project, 2017). In his work “*al-Qanun al-Mas'udi*,” he compiled an encyclopedia of astronomy that included scientific theories and observations. He also wrote “*Shadows*,” an important work discussing the phenomenon of shadows, gnomonics, and the application of trigonometric functions in astronomy. Al-Biruni introduced the technique of triangulation to measure distances on Earth and calculated the Earth's radius to be 6,339.6 km, a value close to modern estimates and not achieved in the West until the 16th century (Sparavigna, 2014).

Al-Biruni also made significant contributions to pharmacy and medicine. In his work “*Kitab al-Saydanah fi al-Tibb*,” he discussed various medicines and medicinal plants, and defined pharmacy as a separate discipline from medicine. He compiled a list of medicines in six languages and emphasized the importance of linguistic accuracy in identifying medicines. This work is considered one of the earliest systematic and comprehensive texts on pharmacy (Roohnavaz et al., 2022).

Al-Biruni was known for his systematic and experimental scientific approach. He emphasized the importance of observation and measurement in scientific research and criticized methods that were not based on empirical evidence. In physics, he developed experimental methods to determine density using a hydrostatic balance, enabling the precise measurement of the density of various substances. This approach made him one of the pioneers of modern scientific methods (Huda, 2016).

Throughout his life, al-Biruni wrote over 146 scientific works spanning various fields, including astronomy, mathematics, geography, pharmacy, and history. Although many of his works have not been translated into Latin, his influence is felt throughout the Islamic world and laid the foundation for the development of science in later generations. His works serve as important references for scientists such as

Copernicus, Galileo, and Newton. UNESCO even dedicated the 1974 edition of *The UNESCO Courier* to honor his contributions (Al Masud & Abdullah, 2021).

Al-Biruni died around 1048 CE in Ghazna (now Afghanistan). His dedication to science and his objective scientific approach made him one of the greatest scientists in Islamic history. His intellectual legacy continues to inspire scientists and researchers to this day. His extensive and profound works reflect a spirit of boundless pursuit of knowledge, making him a role model for future generations in exploring various disciplines

During his travels to India between 1017 and 1030 AD, al-Biruni studied the local culture, religion, and science. His work, “*Kitab tarikh al-hind*,” is a comprehensive study of Indian society, covering aspects of religion, philosophy, and science. He is known as one of the first Muslim scientists to approach the study of other religions with scientific objectivity, documenting religious practices, the caste system, and Indian scientific traditions with a descriptive and analytical approach (Sam & Sharma, 2012).

The research methods applied by al-Biruni in *Kitāb Tā’rīkh al-Hind* demonstrate a comprehensive and in-depth approach. He used participatory observation by living in India for more than a decade and interacting directly with the local community to understand

their social and religious life. In addition, al-Biruni conducted interviews and dialogues with Hindu scholars and religious leaders to gain an authentic understanding of their religious doctrines and practices. He also studied Sanskrit to be able to read and understand original Indian religious and scientific texts. Comparative methods were also employed by comparing various religious and scientific traditions to identify similarities and differences among them. In his analysis, al-Biruni emphasized a critical and objective approach, striving to avoid prejudice. He also adopted a phenomenological approach, which is to understand the religious experiences of Indian society from their own perspective without negative judgment, as well as a dialogical approach to ensure an authentic and inclusive interpretation of other cultures and religions.

### **Al-Biruni's Scientific Method in Islamic Historiography**

Al-Biruni did not merely write based on narratives or oral traditions, but applied the principles of observation, experimentation, and logical analysis in interpreting historical data. His concept of historiography emphasized the importance of empirical evidence in the formation of historical narratives, an approach that became the precursor to the scientific method in modern historiography (Jannah, 2023). He criticized the validity of sources, evaluated information from

various perspectives, and sought to reduce subjective bias in the compilation of historical records. This distinguished al-Biruni from many of his contemporaries, who tended to write history as a linear narrative without critical verification.

Al-Biruni introduced a new methodological framework in historical science that emphasized validity, accuracy, and objectivity. In al-Biruni's view, history is a discipline that requires scientific rigor and cultural openness. He rejected cultural chauvinism and emphasized the importance of studying other cultures objectively and fairly. His cosmopolitan approach is evident in his works discussing intercultural interactions, demonstrating that al-Biruni understood history as a product of cultural and intellectual exchange between civilizations (Ardi, Abdullah, & Al-Tamimi, 2016). This proves that al-Biruni's contribution was not only in building Islamic historiography, but also in expanding the horizons of global thought, inspiring a cross-cultural scientific tradition that was carried on by the Western world during the Renaissance.

The methods developed by al-Biruni position him as a pioneer of an interdisciplinary approach in historiography. He integrated knowledge from various fields mathematics to determine geographical locations, astronomy to measure historical time, and linguistics to translate ancient texts

resulting in historical narratives that are not only descriptive but also analytical (Ahmad, 2010). This approach reinforced the idea that effective historical studies must involve various disciplines in order to gain a complete understanding of the past. Through his work, al-Biruni showed that history is not merely a story of the past, but a science that requires rigorous methods, verification, and argumentation.

In the development of Islamic historiography, al-Biruni's approach became an important model for subsequent generations of historians. He introduced principles such as source criticism, data verification, and comparative analysis, which later became standards in scientific historical writing (Carolina Sparavigna, 2013). Not only that, al-Biruni also showed that historical studies must be free from religious and cultural biases, emphasizing the need for objectivity and scientific neutrality in understanding the realities of the past. These principles were later adopted in modern historiography, both in the Islamic world and in the West. The relevance of al-Biruni's methods in the modern world is increasingly evident given the challenges of contemporary historiography, which demands accuracy, interdisciplinarity, and openness to cross-cultural perspectives. His concept of the importance of empirical evidence and critical analysis has become increasingly vital in the academic world today (Safari, 2023).

Additionally, his efforts to link history with science provide an example of how scientific methods can enrich historical studies and expand the horizons of knowledge, making him a highly relevant figure to study in the effort to develop a better historiographical methodology in the era of globalized knowledge.

The methodological approach applied by al-Biruni not only demonstrates his precision as a scientist but also reflects the depth of his intellectual commitment to understanding Indian culture comprehensively. This methodology became the foundation for the thematic analyses compiled in *Kitab tarikh al-hind*, in which al-Biruni did not merely describe social and religious phenomena, but also critically examined them based on scientific objectivity.

### **Al-Biruni's Phenomenological Approach and Scientific Objectivity**

In *Kitab tarikh al-hind*, al-Biruni adopted a very strong phenomenological approach to understanding Hindu culture and religion. He tried to place himself within the framework of Indian society, without bringing in any preconceptions from his personal beliefs as a Muslim. This can be seen in his persistent efforts to learn Sanskrit in order to access primary texts such as the Vedas and Upanishads. This approach underscores al-Biruni's commitment to scientific objectivity, in which he does not merely record cultural differences but seeks to understand the

substance of religious teachings and practices from an internal perspective. Thus, al-Biruni developed a method of social research that prioritized empathy and precision toward the object of study, which in the modern context is known as the emic approach in cultural anthropology (Farooq, 2002).

In *Kitab tarikh al-hind*, al-Biruni wrote, “We must not compare our customs with theirs, nor must we judge them by our standards.” (al-Biruni, *Kitab tarikh al-hind*, Sachau, 1910). This quote proves that al-Biruni explicitly rejected judging Indian culture by Islamic or Arab standards. He prioritized the principles of scientific objectivity and cultural empathy. With this approach, al-Biruni more closely resembled a modern anthropologist who understood social phenomena from within the culture itself.

This scientific attitude makes al-Biruni not only a historian but also an early anthropologist capable of bridging cultural differences through studies based on direct observation and critical analysis. Al-Biruni's openness to cultural diversity shows that he had transcended the sectarian boundaries common in his time. His approach shows that cross-cultural understanding cannot be achieved authoritatively without first delving into the internal aspects of that culture. This phenomenon reinforces the importance of *Kitab tarikh al-hind* in the tradition of

comparative religious and cultural studies to this day (Farooq, 2022).

### **Analysis of the Indian Caste System and Social Structure**

In his analysis of Indian society, al-Biruni provides a detailed description of the caste system, dividing it into four main varna: Brahmana, Kshatriya, Vaishya, and Shudra. He also notes the existence of groups called Antyaja, who are outside the varna system and experience social discrimination (Das et al., 2022). Interestingly, al-Biruni did not merely record this structure as a social fact, but also analyzed how the caste system influenced daily life, the distribution of work, and power relations in India. He showed that the caste system was deeply rooted in society through religious justifications provided by Hindu scriptures such as the *Manusmriti* (International & Journal, 2023).

Al-Biruni described the Indian caste system in detail in his writing, “The Hindus divide their society into four classes: the Brahman, the Kshatriya, the Vaisya, and the Shudra, and a multitude of subdivisions beyond these.” (al-Biruni, *Kitab tarikh al-hind*, Sachau, 1910). Through this quote, it is clear that Al-Biruni not only described but also criticized India's social stratification based on birth. He observed that this grouping had a major impact on the economic, social, and spiritual life of Indian society.

Al-Biruni criticized the social implications of the caste system, highlighting the injustices it imposed on certain social groups. He observed that social stratification was not based on individual merit but on birth, thereby creating structural inequalities that were difficult to overcome. This critical view demonstrates Al-Biruni's courage in evaluating foreign social systems while maintaining a scientific and objective stance. Thus, his analysis of the Indian caste system affirms a research method that is not only descriptive but also evaluative (International & Journal, 2023).

#### **Comparative Study of Hindu Religious Practices and Philosophy**

Al-Biruni demonstrated extraordinary intellectual ability in conducting comparative studies between Hindu, Islamic, and Greek traditions. He compared metaphysical concepts such as the creation of the universe, the existence of the soul, and moral principles in the three systems of thought. For example, al-Biruni examined the concepts of purusha (soul) and prakriti (matter) in Yoga teachings, then compared them with Islamic concepts of ruh and nafs, as well as Greek philosophy on substance and form. This effort demonstrates the depth of al-Biruni's philosophical analysis, which was not only textual but also conceptual (Hasan, 2023).

Al-Biruni discussed the concepts of God and the soul in Hinduism in his writing, "The Hindus believe in a self-existing being which has created the world, and which is omnipresent." (Al-Biruni, *Kitab tarikh al-hind*, Sachau, 1910). In this quote, al-Biruni compares the concept of God in Hinduism with the concept of tawhid in Islam, as well as comparing it with Greek philosophy. With this approach, al-Biruni opens up space for objective comparative studies between religions.

Through this comparative approach, al-Biruni sought to find common ground and fundamental differences between scientific traditions. He did not place one system above another, but rather presented a neutral and in-depth analysis. This approach is very modern in the context of religious and philosophical studies, showing that intercultural dialogue can be built on a foundation of critical understanding and mutual respect. Thus, *Kitab tarikh al-hind* became one of the early works to introduce the method of cross-traditional comparison, which remains relevant in contemporary religious studies.

#### **Al-Biruni's Contributions to Science and Scientific Methodology**

A historian and anthropologist, al-Biruni is widely known for his contributions to astronomy, geography, and mathematics. In *Kitab tarikh al-hind*, he made accurate

astronomical observations about the Indian calendar system, the position of the sun, and the movements of the planets. He compared his observations with theories from Muslim and Greek scientists, demonstrating a scientific approach based on observation and verification. This demonstrates that al-Biruni integrated social and cultural studies as auxiliary sciences with rigorous scientific methods, making him a pioneer in multidisciplinary research methodology (Bir et al., 2025). Al-Biruni demonstrated the scientific method in astronomical observation: "I have calculated the longitudes and latitudes of Indian cities by my own observations." (al-Biruni, *Kitab tarikh al-hind*, Sachau, 1910). From this, it is clear that al-Biruni used direct observation and mathematical measurement to confirm geographical and astronomical data. This confirms the integration of historical, cultural, and natural sciences in his work.

*Kitāb Taḥqīq'l-Hind* by al-Biruni applied an empirical approach in his research on Indian society. He conducted direct observations of the social, cultural, and religious life of the Hindu community. For more than a decade, he lived in India, studied Sanskrit, and interacted directly with local scholars and religious leaders (Shafiq, 2011). This approach enabled al-Biruni to obtain accurate and in-depth data on the religious traditions and practices of Indian society (Ardi dkk., 2016).

One of the strengths of al-Biruni's methodology in *Kitab tarikh al-hind* is his use of authentic primary sources from Indian traditions. He did not rely solely on secondary narratives from earlier Arab writers, but actively translated and studied original texts in Sanskrit. Among the main works that al-Biruni used as primary references were *Sūrya Siddhānta* and *Brahmasiddhānta* by Brahmagupta, which deal with astronomy and mathematics. In addition, he also referred to *Yoga Sūtra* by Patañjali and the *Sāṅkhya* doctrine by Kapila in explaining Hindu philosophy and belief systems.

Al-Biruni read and studied these works directly through his intensive efforts in learning Sanskrit. He also mentioned the *Paulīśasiddhānta*, *Karanasāra* by Vitteśvara, and the *Caraka Saṃhitā* text related to traditional Indian medicine. In addition to written texts, al-Biruni also obtained primary information through interviews with Hindu pandits and scholars, as well as from direct observation of the religious and social practices of Indian society. It is this integration of primary texts and field observations that gives *Kitab tarikh al-hind* its high scientific value. Al-Biruni himself explicitly emphasized the importance of comparing local Indian sources with Islamic and Greek literature as an effort to build an objective cross-cultural understanding. Therefore, the method applied by al-Biruni was not only

narrative, but also analytical and critical, making this work an important milestone in the tradition of scientific historiography.

In *Kitab Tā'rikh al-Hind*, al-Biruni used a comparative method to analyze the similarities and differences between various religious traditions, including Hinduism, Islam, and other religions. He compared the doctrines, ritual practices, and cosmological views of various religions with an objective and critical approach (Verdon & Yano, 2020). This method enabled him to understand these religions in their own context without prejudice (Karyanta et al., 2020).

Al-Biruni also applied a phenomenological approach by seeking to understand the religious experiences of Indian society from their own perspective. He engaged in dialogue with Hindu religious leaders and scholars to gain a deeper understanding of their beliefs and practices. This dialogical approach demonstrates al-Biruni's openness to cultural and religious differences, as well as his commitment to understanding "the other" authentically.

The scientific method developed by al-Biruni emphasized the validation of data through direct observation and comparison between sources, an approach that was rarely applied at that time. This proves the superiority of *Kitab tarikh al-hind* as a scientific work that does not only rely on narrative tradition but also

empirical evidence. The concept of data triangulation, which is standard in modern research, was actually applied by al-Biruni more than a thousand years ago. Thus, al-Biruni's contribution is not only important in the history of Islam, but also in the history of the development of scientific methodology worldwide (Bir et al., 2025).

### **Relevance and Influence of *Kitab al-Hind* in Contemporary Studies**

The relevance of *Kitab tarikh al-hind* in modern studies cannot be separated from the scientific, objective, and cross-cultural approach introduced by al-Biruni. In the contemporary academic context, his work is an important reference in the fields of cultural anthropology, religious phenomenology, and comparative religious studies. Al-Biruni's phenomenological approach to understanding Hinduism is considered a classic model in religious studies, where understanding must be based on the internal perspective of the community being studied. This concept was later developed further in modern theories of religious phenomenology.

Furthermore, the influence of *Kitab tarikh al-hind* can be felt in cross-cultural studies that emphasize the importance of dialogue between civilizations. With his neutral and evidence-based approach, al-Biruni taught the importance of respecting cultural diversity and beliefs without judging or belittling them. In the midst of globalization and increasingly complex

cultural interactions, the methodological principles proposed by al-Biruni in Kitab tarikh al-hind are becoming increasingly important for building a fair, empathetic, and scientific understanding of this diverse world (Shafiq, 2011).

## CONCLUSION

Al-Biruni's contribution to Islamic historiography through his work Kitab tarikh al-hind showed a remarkable methodological leap for his time. He did not merely record history based on traditional narratives, but developed a scientific method that emphasized the importance of observation, verification, and critical analysis of historical sources. Through a phenomenological, descriptive-comparative, and interdisciplinary approach, al-Biruni was able to study the culture, religion, and social structure of Indian society objectively and in depth. His efforts to study Sanskrit and compare Hindu teachings with Islamic and Greek traditions demonstrate an open and unbiased academic spirit. Thus, al-Biruni was not only a pioneer in Islamic historiography but also paved the way for the development of cultural anthropology, comparative religious studies, and scientific methodology in historical research in both the Islamic world and the West.

Through this research, it can be concluded that Kitab tarikh al-hind is clear evidence of the relevance of al-Biruni's

approach in the modern academic world, particularly in cross-cultural and interdisciplinary studies. Concepts such as cultural empathy, scientific observation, source criticism, and empirical data testing introduced by al-Biruni have become important principles that inspire the development of modern historiography. Al-Biruni's thinking teaches that understanding history and culture cannot be separated from methodological rigor and an objective attitude toward human diversity. Therefore, studying al-Biruni's methods is not only important for understanding Islamic historiography but also for enriching the global discourse on scientific and cross-cultural approaches in contemporary historical and social research.

Kitab tarikh al-hind demonstrates its excellence as a scientific work that relies not only on narrative tradition but also on empirical evidence. The concept of data triangulation, which is standard in modern research, was actually applied by al-Biruni more than a thousand years ago.

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