Abū Yūsuf Ya’qūb ibn Ishāq Al-Kindī, an Arab aristocrat from the tribe of Kindah, was born in Basrah ca. 800 CE and passed away in Baghdad around 870 (or ca. 196–256 AH). This remarkable polymath promoted the collection of ancient scientific knowledge and its translation into Arabic. Al-Kindī worked most of his life in the capital Baghdad, where he benefitted from the patronage of the powerful ʿAbbāssid caliphs al-Maʿmūn (rg. 813–833), al-Muʿtaṣim (rg. 833–842), and al-Wāthiq (rg. 842–847) who were keenly interested in harmonizing the legacy of Hellenic sciences with Islamic revelation. Caliph al-Maʿmūn had expanded the palace library into the major intellectual institution BAYT al-HIKMAH (‘Wisdom House’) where Arabic translations from Pahlavi, Syriac, Greek and Sanskrit were made by teams of scholars. Al-Kindī worked among them, and he became the tutor of Prince Aḥmad, son of the caliph al-Muʿtaṣim to whom al-Kindī dedicated his famous work On First Philosophy.

Al-Kindī was a pioneer in chemistry, physics, psycho-somatic therapeutics, geometry, optics, music theory, as well as philosophy of science. His significant mathematical writings greatly facilitated the diffusion of the Indian numerals into S.W. Asia & N. Africa (today called ‘Arabic numerals’). A distinctive feature of his work was the conscious application of mathematics and quantification, and his invention of specific laboratory apparatus to implement experiments. Al-Kindī invented a mathematical scale to quantify the strength of a drug; as well as a system linked to phases of the Moon permitting a doctor to determine in advance the most critical days of a patient’s illness; while he provided the first scientific diagnosis and treatment for epilepsy, and developed psycho-cognitive techniques to combat depression.

The tenth century book seller Ibn al-Nadīm states al-Kindī wrote over 250 books—regrettably less than one-sixth of them are extant, some in mediaeval Latin translations. In the mid-twentieth century a manuscript in Turkey was identified containing twenty-four short
philosophic writings; these were published in Cairo in 1950. Fresh discoveries and new studies over the past several decades have made his seminal contribution to both Islamic and world civilisation appreciated more accurately. Recent research shows that Al-Kindi also made fundamental contributions in cryptography, weather forecasting, botany, study of environmental pollution, pharmacology, cosmetics and the manufacture of perfume products (his Book On Chemistry of Perfume was recently published).

During the first half of the ninth century (third century AH) al-Kindi gathered together an outstanding group of scholars in Iraq from several religions, known today as the ‘Kindi Circle’, whose influence persisted several centuries until the era of al-Ghazālī. He directed them in the study of Greek, Persian and Indian wisdom, organized the production of a vast body of works on all aspects of natural science, and acted as the spiritual leader of his ecumenical circle. He specified the guiding principle behind this great effort:

We must not be ashamed to admire the truth or to acquire it, from wherever it comes. Even if it should come from far-flung nations and foreign peoples, there is for the student of truth nothing more important than the truth ...; Study the books of wisdom! for that is the feast of the rational souls.

[ On First Philosophy]

Perhaps his most important achievement was the formation of a philosophical terminology (specific terms for concepts) and of a philosophical language in Arabic, which led to a linguistic and conceptual transformation. He systematized this in his glossary of terms and definitions (Kitāb al-Ḥudūd /Epistle on Definitions and the Description of Things). In the long run this signaled the rise of a rational discourse beyond the discourse of traditionist ʿulamāʾ or speculative theologians. Al-Kindi intended a coalition of the Islamic Faith with Hellenic thought (Falsafah & Science). Philosophy and science were understood to vindicate the pursuit of rational scientific activity in the service of Islam.

In his On Definitions al-Kindi gave six definitions of philosophy (Rasāʾīl, ed. Abū Rūdah, I pp.172–4):
1. Love of wisdom. 2. To make oneself resemble divine actions to the extent possible for humans (i.e. to perfect virtue). 3. To be concerned with death—with the soul abandoning preoccupation with the body, and the death of the passions. 4. The ‘Art of arts’ and the Wisdom of wisdoms. 5. Human knowledge of oneself [al-Kindi likes this definition, for it leads to knowledge of man as microcosm]. 6. Knowledge of eternal and universal things to the extent possible for humans (i.e. the essence of philosophy).

Al-Kindi’s teaching on Mind (al-ʿaql) stressed the immaterial substance of intelligible realities as well as of the rational soul. He also taught that human knowledge (ʿilm insānī) may derive from various sources and may still be expected to develop, to increase and be perfected. He and his circle took this duty very seriously. He emphasized the ultimate condition and value of scientific knowledge as a religious enterprise for intellectuals: Only he who purifies his soul will gain true happiness and ultimate vision of truth.

Al-Kindi was committed to formulate agreements between certain philosophical ideas and specific articles of Islamic faith, elaborating a mode of philosophic tawḥīd where Allāh was described as ‘The ONE First Real’ /al-Wāḥid al-Ḥaqq al-Awwal. He defended the Qur’anic doctrines of creation from nothing and that the universe will come to an end. His writing On the Unity of God and the Limitation of the Body of the World affirmed the finite temporal nature of the created world—against Aristotle. In his cosmologic work On the Prostration of the Outermost Sphere he explained that the heavens are possessed of souls and freely follow God’s command, moving in such a way that the providentially intended sublunary events will occur. According to al-Kindi, this is what the Qur’an refers to when stating that the stars ‘prostrate’ themselves before God (c.f. Q 55:6). He viewed philosophy to be the contents of “the science of things and their true nature” — and identical to the message of the Prophets: the science of divine Sovereignty and divine ONEness, and sacred teachings of morality and ethics. Al-Kindi thus prayed for God’s assistance in pursuit of knowledge and venerated the Prophet’s message.
Among the many important writings produced by the Kindi Circle we should mention an extensive commentary-paraphrase from the Enneads books IV-VI by Plotinus (d. 270 or 271 CE), the great Neoplatonic mystic from Alexandria. This was translated for Prince Aḥmad by the Christian ʿAbd al-Maṣḥ ibn Nāʿīmah from Ḥimṣ (in central Syria) with al-Kindi editing its Arabic terminology. This highly influential writing was transmitted and received by Muslim thinkers as the true ‘Theology [uthūlūjiyyah/divine science] of Aristotle’. Its teaching on Soul and self-knowing was fundamental for al-Kindi’s enterprise of rational research. Closely related to the ‘Theology of Aristotle’ were translated selections from the Elements of Theology of the major Neoplatonic thinker Proclus (d. 485 CE). Such writings convey a monotheistic, creationist interpretation of cosmologic Soul-science and served al-Kindi’s Circle as a philosophic model for Islamic tawḥīd. The distinctive literary style and consistent technical vocabulary of the Arabic Plotinus and Proclus translations produced for al-Kindi confirm that a group of multi-religious collaborators united by a common purpose promoted Hellenic thought in Arabic in order to propagate a natural theology transcending factional dogmas. The same circle of early translators working under al-Kindi’s direction translated the Neo-Pythagorean guide to number theory by Nichomachus, Introduction to Arithmetic, reworked by al-Kindi from a version by Ḥabīb b. Bihrīz (Metropolitan of Mosul). The most productive translator of philosophic works in his group was Yūḥannā or Yaḥyā b. al-Biṭrīq, a former mawlā of caliph al-Maʾmūn.

For the last twenty years of his life this great scientist suffered humiliation and censure. When caliph al-Mutawakkil (rg. 847–861) took power he championed the cause of Ḥanbalī traditionalism to win popular support for his rule. This caliph put an end to the Miḥnah/inquisition which had enforced Muʿtazilite doctrine, repressed the minority Shiʿah as well as non-Muslims, and had al-Kindi placed under house arrest while his personal library was confiscated. The triumph of orthodoxy could not tolerate the marriage of revelation and scientific rationalism. Al-Kindi’s legacy persisted as a distinct school highly
esteemed by professional scholars: mathematicians, astronomers, physicians, and within the secretarial class in government administration and courts. It was transformed into literature and became part of the Islamic-Hellenic synthesis central to the classical canon of Adab which furnished the basis for a rationalist ethics of knowledge and virtue.

Al-Kindi’s scientific studies provided arguments for the harmonious co-existence of rational and religious sciences—not only for Islam, but for all divinely revealed Faiths. D. Gutas states that the Kindi Circle “developed an overarching vision of the unity and interrelatedness of all knowledge and its research along verifiable and rational lines.” Without the achievements of this ‘philosopher of the Arabs’ who brought reason into the orbit of revelation, and because of al-Kindi’s systematisation and Arabisation of philosophic language, his great successors al-Fārābī and Ibn Sīnā would have been unable to express their ideas. If the ‘Kindi Circle’ and their continuators had not created the language of Arabic-Islamic rationalism, then Europe and the Muslim world from the Middle Ages until today would not have found a common language in assigning names to the principles of Being and understanding human epistemic faculties. He spearheaded the first truly international ecumenist movement known in history.

Further Reading: