The Vedic1 and post-Vedic2 texts mention methods of reckoning time in ancient India but there is no epigraphic evidence which indicates that India had any regular use of an era in the 3rd century B.C. There are at least four3 kinds of years which were used by the Vedic Aryans. These are (1) lunar year of 354 days, (2) civil year of 360 days, (3) tropical year of 365 days and (4) sidereal year of 366 days. According to Indian tradition, revolutions of the Sun, the Moon and, in an auxiliary sense, the Jupiter regulate divisions of time.

Our investigations prove that in the system of dating early Indian inscriptions initially the regnal years were used. Later these regnal years developed into usual eras, local or regional, under different politico-administrative necessity of the rulers concerned. From c. A.D. 1200 to A.D. 1757 the pure lunar calendar of the Arabs and Turks4 was used in civil administration in the regions over which they ruled. The Mughal emperor Akbar the Great introduced, since 1584 a system of dating based on the solar calendar of Persia. He also introduced a uniform system of dating with political unification of the Indian sub-continent. An example of this phenomenon is the Fasli era related to FasP5 or crop, and its variations were introduced by Akbar in India for solarising the lunar Hijri year 971. He also introduced a uniform and reformed system of land measurement like the Gaz-i Sikandari,6 Gaz-i-Ilahti7, Bigha-i-Daftar8 etc.

Early Indian inscriptions are dated in the regnal year of the ruling king. This system was introduced in India by the Mauryan emperor Aśoka in the 3rd century B.C. Aśokan edicts prove that only regnal years9, days10 (sometime counted in nights) and also lunar days11 were known in Mauryan India.

The system of dating inscriptions over a long period of time from a fixed year was certainly introduced into the Indian sub-continent by the foreign rulers who poured into India through the North-West Gates12. By the time of Aśoka, the Greeks had developed a much improved calendar based on Meton cycle.13 They also founded an era which was known as the Seleucid era14. It was in general use through centuries. Cultural intercourse with the Western
countries was an important feature of the foreign policy of Aśoka. Subsequently Western astronomy perhaps influenced Indian calendrical system.

Indians did not adopt a uniform era. On the other hand, independent eras were originally connected with names of their promulgators. At least a few of them were Indianised by the rulers who used them.

Indian epigraphs, which bear evidence on using regnal years, are found roughly all over the Indian sub-continent. Subsequently, different eras came into prominence. The Old Śaka era\(^1\) of 170 B.C. was used in inscriptions from the North-Western part of the Indian sub-continent\(^1\)\(^6\). Later, the Azes era counted from 58 B.C.\(^1\)\(^7\) was also used in the inscriptions from the same region. It was also used by the indigenous rulers under new names like Mālava,\(^1\)\(^8\) Kṛita,\(^1\)\(^9\) and Vikrama\(^2\)\(^0\). The Kanishka era or the Śaka era commencing from A.D. 78\(^2\)\(^1\) was popular in Western India, and in parts of Central India, and upper Western Deccan\(^2\)\(^2\) by the first three centuries of its use. This era also spread towards the Central and Lower Deccan and some areas immediately to its south. It was in use in M.P., Andhra, Orissa and Bengal\(^2\)\(^3\).

We have also epigraphic data which suggest that the Śaka era of A.D. 78 also reached South East Asia\(^2\)\(^4\).

The Gupta era was used in official charters in U.P., Gujrat, M.P., Bihar, Orissa and Bengal region\(^2\)\(^5\). It was also used by the feudatories of the Imperial Guptas\(^2\)\(^6\) and survived even after the final extinction\(^2\)\(^7\) of Gupta rule. In the Gujrat area this era came to be known as Valabhi-sarivat.\(^2\)\(^8\)

The Harsha era of A.D. 606 was used in inscriptions found from Bihar, U.P., Punjab and Nepal region\(^2\)\(^9\). There are also Gāṅgeya era\(^3\)\(^0\), Kalachuri-Chedi or Kathika era\(^3\)\(^1\), Chālukya era,\(^3\)\(^2\) Kollam era\(^3\)\(^3\) etc. which may be considered as regional eras. They are found in inscriptions from different parts of the Indian sub-continent.

There are instances in which dates are found with the hundreds omitted. According to al-Bīrūnī\(^3\)\(^4\), “Common people in India date by the years of a centenium, which they called sarivatsara. If a centenium is finished, they drop it, and simply to date by
a new one. The era is called Lokakāla, i.e. the era of Nation at large. But of this era people give such totally different accounts that I have no means of making out the truth." The system has been discussed by M. N. Saha. This system of omitting hundreds led to the rise of independent eras. An example of this phenomenon is the Newari-saṁvat, which was initiated in A.D. 878-79 and originated from the Saka era of A.D. 78.

In this connection the view of Alakananda Bhattacharyya may be mentioned. According to her hypothesis, the year 520 in an inscription of Śivadeva from Nepal and the year 534 in another inscription belong to the same era. The latter inscription mentions the name of the dūtaka. Vikramasena. The same person is also mentioned in an inscription of Amśuvarman, dated in the year 34. If Vikramasena of both the inscriptions is one and the same person, then we may consider that in the time of Amśuvarman epigraphic records of the rulers of Nepal were dated with the figure for hundred omitted. This hypothesis is corroborated by the Nabahil stone inscription which refers to Mahāśāmanta Amśuvarman as an independent ruler and to Bhogavarman as the dūtaka. It is dated in the year 500 (+ -). Then it is clear that Amśuvarman should have continued the earlier reckoning and subsequently used the lower dates omitting the numerical notation for 500.

According to R.C. Majumdar, the practice of omitting the figure for hundred from the time of Amśuvarman continued for three centuries till the commencement of the Newari era in A.D. 879. It is not clear to us why in the period of Amśuvarman the era of A.D. 78 i.e. Kanishka era, was "reformed" by omitting hundred. But it is certain that this system created scope for the origin of regional eras like the Newari era counted from A.D. 878-79.

There were local eras also. An epigraph preserved in the Dhaka Museum, gives the date as srīmad-Devātideva-bhaṭṭārakasya pravardhamāna-vijaya-rājye saptasaptate Mārggaśīrsha-saṁvatsare/Āśādha-śukla trayodasyāṁ..., i.e., "in the prosperous year 77 of the illustrious lord Devātideva, of the year (called) Mārggaśīrsha,
on the 13th day of the bright half of the month of Āshāḍha". It is hardly credible to consider the year 77 as the regnal year. It is better to take it as a local or regional era i.e. Devātideva era.

The Hijri era of A.D. 622 was introduced in India by the Arabs and Turkish conquerors. It was used not only in Arabic and Persian epigraphs, but sometimes also in inscriptions in Sanskrit and other Indian languages. It may be pointed out, as has been done before, that the Hijri era, introduced in India, was not linked with the seasonal crops. It was Fasli era which was introduced during the reign of Akbar the Great related to Fasl or crop, by solarising the lunar Hijri year 971. It became easier to keep account of the annual revenue collected at the end of the Rabi and Kharif crops. Initially introduced in the Punjab and U.P. region, the Fasli san gained popularity under different names throughout the empire of Akbar. In the reign of Shāh Jāhān it was introduced in South India. The Tripuri Era (A.D. 590) and the Malla era (A.D. 694) are only modifications of the Fasli san. There are also such eras like Vilāyatī, Amli, Parganāti etc.

It may be pointed out that solarisation of months led to the rise of an independent era. An example of this phenomenon is the Allai or the Ilahi era once introduced by Akbar; but it was discontinued. However, the fact remains that the luni-solar system of dating was introduced in India in the early centuries of the Christian era and continued to be used through the ages. The system is still being followed in religious ceremonies, particularly in computing the exact date of the function.

NOTES AND REFERENCE

1. RV. I.110.4; X. 62.2.
2. TS. V.5.7.1-3; Pañchasiddhiñaṅkā. XII. I.
4. M. N. Saha, "Different methods of date recording in Ancient and Medieval India, and the origin of the Śaka Era," JAS,
vol. XXXV, Number, 5, Calcutta, 1994, pp. 119-120.
10. Ibid.
11. Ibid.
14. Ibid.
16. Ibid.
17. See our Chapter on the Azes era; See also B. N. Mukherjee, op. cit., pp. 107ff and IMB, vol.XX, 1985, p. 7ff.
18. D. C. Sircar, IE, pp. 25 ff; See also IMB, vol. XX, pp. 8-10.
19. Ibid.
21. See our discussion on Kanishka era.
22. Ibid.
23. Ibid.
25. See our discussion on Gupta era.
26. Ibid.
27. Ibid.
28. Ibid.
29. See our discussion on Harsha era.
30. D. C. Sircar, op. cit., pp. 289—290; This era is not related to our period concerned.
31. See our discussion on Kalachuri-Chedi era or Kathika era.
32. D. C. Sircar, op. cit., pp. 302—304; This era is not related to our period concerned.
34. *JAS*, vol. XXXV, No. 2, p. 133.
42. *Ibid.*