

Marking Time

From earliest times humans have used the seasons, the movement of Earth, and the passage of the Sun and the Moon across the sky to measure time. Humans use these measurements to develop the rhythms of their lives. There have been countless methods devised to count the days. Read the information below and then answer the questions that follow.

Since civilizations began, people have created calendars to keep track of time. They were used to mark holidays and festivals, and to plan work, such as planting seeds and harvesting crops. Our calendar, the Gregorian calendar, is internationally recognized. But it is far from the only calendar in use. The Balinese, Chinese, Indian, Islamic, and Jewish are other currently valid calendars. Calendars no longer in use include the French (Republican), Mayan, Roman (Julian), Future, and Ancient.

Calendars have always been closely linked with astronomy. Most calendars are based in some form on the phases of the Moon and the Sun. It was the Julian calendar, instituted in Rome by Julius Caesar in 46 B.C. that first set the length of a year at 365 days, adding one day to the year every four years. In 1582 Pope Gregory XIII modified the Julian calendar to our current Gregorian calendar. The Gregorian calendar is a solar calendar in that it does not take into consideration the Moon in its calculations. However, it does contain rules for determining Easter and other religious holidays that are based on both the Sun and the Moon.

The French Revolutionary calendar is an interesting example in that it incorporates political and cultural aspects into its system. The calendar begins on the Gregorian calendar date of September 22, 1792. This date is 1 Vendémiaire of the year 1 of the Republic, the day the French Revolution was established. The names of the months of the year were determined by the French poets Chénier and Fabre d’Eglantine. They used the names of plants, domestic animals, and tools to name the months. The months also rhymed three by three, according to the “sonority” of the seasons.

The Republican year was not divided into weeks. Instead, each month consisted of three décades of 10 days each, the tenth day being a day of rest. (The French revolutionary government went so far as to establish a new clock. Using this clock, the day was divided into 10 hours of 100 minutes each. Each minute had 100 seconds. Thus there were exactly 100,000 seconds in each day!) This system was created to de-Christianize the calendar, but it proved highly unpopular. Under the new system, the common worker now only had one day in 10 off, rather than one in seven. Twelve months consisting of 30 days each also left five or six extra days at the end of the year. These days were each given special names. Table 1 describes the naming of the Republican calendar.

Chapter 2, Critical Thinking Activity, continued

The Republican calendar also had to incorporate leap years. The leap year was introduced to keep New Year’s Day on the autumnal equinox. But keeping on track proved to be difficult. The years 3, 7, and 11 were leap years. The years 15 and 20 should have been leap years as well, after which a regular cycle of every fourth year would occur. Year 15 was never reached, however, as Emperor Napoleon Bonaparte abolished the calendar on January 1, 1806 (Gregorian time that is).

Naming the Republican Calendar		
Months of the Year	Days of the Décade	Year-end Special Days
Vendémiaire	Primidi	1. Jour de la vertu (Virtue Day)
Brumaire	Duodi	2. Jour du génie (Genius Day)
Frimaire	Tridi	3. Jour du travail (Labor Day)
Nivôse	Quartidi	4. Jour de l’opinion (Reason Day)
Pluviôse	Quintidi	5. Jour des récompenses (Rewards Day)
Ventôse	Sextidi	6. Jour de la révolution (Revolution Day) (the leap day)
Germinal	Septidi	
Floréal	Octidi	
Prairial	Nonidi	
Messidor	Decadi	
Thermidor		
Fructidor		

1. On what events are most calendars based?

2. What appears to be the basis for the organization of the French Revolutionary calendar?

3. How does the French Revolutionary calendar differ from the Gregorian calendar?

4. How is the French Revolutionary calendar similar to all others?
