Holiday Calendar Resources

Some Calendars of Yesterday and Today

A calendar is a system of measuring and recording the passage of time. Early calendars used the lunar month, the interval between successive full moons, as a unit of time. A lunar month lasts about 29.5 days, so twelve such months amount to about 354 days, 11 days shorter than a true solar year, which has 365 days.

Attempts to reconcile lunar months with the solar year occurred in various ways. The most noted ancient effort was that of Egyptian astronomers, working from precise mathematical observations and borrowing from Babylonian astronomy, who drew up the Roman calendar that Julius Caesar introduced.

The Julian calendar. By 46 B.C., the Roman calendar was about 3 months ahead of the seasons, so spring began in June. Julius Caesar ordered the Romans to disregard the moon in calculating their calendars. The resulting new calendar, based on the Egyptian solar calendar, was divided into 12 months of 31 and 30 days, except for February, which had only 29 days. Every fourth year, it would have 30 days. The year 46 B.C. was assigned 445 days; it was called *ultimus annus confusionis,* "the last year of confusion." A Julian year lasted 365.25 days. This Julian calendar was widely used for more than 1,500 years. Still the basis of the Orthodox Christian liturgical calendar, it is used by all Orthodox Christian churches to determine the date of Easter.

The **Gregorian calendar**. By the late sixteenth century, the difference between the Julian calendar and the seasons had grown to ten days because the Julian year, averaging 365.25 days, was slightly longer than the actual solar year. In 1582, Pope Gregory XIII ordered ten days dropped from October making the day that would have been October 5, 1582, into October 15. The Gregorian calendar has 12 months, 11 with 30 or 31 days. The other month, February, normally has 28 days. Every fourth year, called a leap year, it has 29 days. To correct the Julian calendar's error regularly, the pope decreed that February would have an extra day in century years that could be divided evenly by 400, such as 1600 and 2000. The Gregorian calendar was based on the current calculation of the year of Jesus Christ's birth. Thus, dates before that year are often identified as B.C. (before Christ), those after as A.D. (*anno Domini* “in the year of our Lord”). The Gregorian calendar continues to be the one used by most of the world today.

The **Christian church calendar** begins with the year of Jesus Christ’s birth, as calculated by the Gregorian calendar. This yearly calendar, observed by the Catholic Church, is regulated by the sun and partly by the moon. Immovable feasts, based on the solar year, include Christmas and such feasts as the Nativity of the Blessed Virgin. Such days as Ash Wednesday, Palm Sunday and Easter are called movable feasts because their dates vary from year to year, according to the phases of the moon. There is no uniform Protestant calendar. Some Protestant denominations, such as the Episcopalians and Lutherans, follow a complex calendar closely resembling the Catholic, while other denominations, such as Baptists, follow a greatly simplified yearly calendar.

The **Orthodox Christian church calendar**. The Orthodox Churches that have adopted the New Calendar observe Christmas with the other Churches of Christendom on December 25; Orthodox Churches that have not adopted it celebrate Christmas 13 days later, on January 7. The Orthodox Church bases its calculations for the date of Easter on the Julian Calendar, which was in use at the time of the First Ecumenical Synod. According to the ruling of the First Ecumenical Synod in 325,

Easter Sunday should fall on the Sunday that follows the first moon after the vernal equinox. If the full moon happens to fall on a Sunday, Easter is observed the following Sunday. March 21 is the day taken to be the invariable date of the vernal equinox.

The **Hebrew calendar** begins at an estimated moment of the world's creation based on the genealogies in the Torah. To find a year in the Hebrew calendar requires adding 3,760 to the date in the Gregorian calendar. For example, the year beginning with a celebration on September 30, 2008, and ending at sundown on October 1, 2009, is year 5769 in the Hebrew calendar. The Hebrew year is based on the moon and normally consists of 12 months: *Tishri, Heshvan, Kislev, Tevet, Shevat, Adar, Nisan, Iyar, Sivan, Tammuz, Av, and Elul.* Approximately every third year an additional month is added to align the shorter lunar year with the solar year.

The **Islamic calendar** begins with Muhammad's migration from Mecca to Medina. The migration, called the *Hegira,* took place in A.D. 622, according to the Gregorian calendar. The new year 1430 occurs on December 29, 2008. The Islamic year is based on the moon, and has 12 months, alternately 30 and 29 days long. These months are *Muharram, Safar, Rabi ul-Awwal, Rabi ul-Thani, Jumada-L-Oula, Jumada-L-Thani, Rajab, Shaban, Ramadan, Shawwal, Dhu-L-Qui-Da,* and *Dhu-L-Hijjah.* Because the Islamic year is 354 days shorter than the solar year, the Islamic New Year moves backward through the seasons in a course of 32½ years. The Islamic calendar divides time into cycles 30 years long. During each cycle, 19 years have the regular 354 days, and 11 years have an extra day each. This method of counting time makes the Islamic year nearly as accurate in measuring the lunar year as the Gregorian calendar is in measuring the solar year.

The **Chinese calendar** begins at 2637 B.C., the year in which the legendary Emperor Huangdi is believed to have invented it. This calendar counts years in cycles of 60. The sixty-year cycle consists of a set of year names that are created by pairing a name from a list of ten Celestial Stems named after 10 Chinese constellations and twelve Terrestrial Branches named after twelve animals (These sets of stems are listed on the next page). After six repetitions of the set of stems and five repetitions of the branches (i.e., 60 years), a complete cycle of pairs is completed and a new cycle begins. Since the current sixty-year cycle started on February 2, 1984, the year 2008 in the Gregorian calendar is the 26th year in the 78th cycle. The year 2009 is also the Year of the Ox or the year Yi-Chou.

The Chinese year is based on the moon and generally consists of 12 months. Each month begins at the new moon and has 29 or 30 days. Since a month is repeated seven times during each 19-year period, the calendar remains in approximate alignment with the seasons. The year starts at the second new moon after the beginning of winter in the Northern Hemisphere. Thus, the Chinese New Year occurs no earlier than January 21 and no later than February 19.

The **Hindu calendar** is extremely complex. Used only for religious holidays, it varies greatly from region to region. However, most divide an approximate solar year of 360 days into twelve months. Each day is 1/30th of a month, with the adoption of a leap month every sixth months. Time measurements based on observations of the constellations are used along with the calendar.

The **Buddhist calendar:** Theravada Buddhists (living primarily in Sri Lanka, Laos, Burma, Thailand, Vietnam, and Cambodia) use a Hindu calendar as the basis for their calendar. They calculate the months by the moon and the new year by the sun's position in relation to the twelve segments of the heavens, each named for a sign of the zodiac. The solar new year begins when the sun enters Aries, usually between April 13th and 18th. The lunar months alternate between twenty-nine and thirty days in length. Mahayana Buddhists (mostly in Tibet, Mongolia, China, Korea, and Japan) base their holidays on Buddhist, Chinese, or Gregorian calendars.

Sources

- Thompson, Sue Ellen and Barbara W. Carlson. *Holidays, Festivals, and Celebrations of the World Dictionary*. Detroit: Omnigraphics, Inc., 1994.
- *The World Book Encyclopedia*. Chicago: World Book Inc., 1996.

The Chinese Calendar

The Chinese calendar does not count years in an infinite sequence. Instead, within each sixty-year cycle, each year is assigned a name consisting of two components: "Celestial Stem" and "Terrestrial Stem."

Celestial Stems (Heavenly stems)

1. Jia
2. Yi
3. Bing
4. Ding
5. Wu
6. Ji
7. Geng
8. Xin
9. Ren
10. Gui

Terrestrial Stems (Earthly branches)

1. Zi (Rat)
2. Chou (Ox)
3. Yin (Tiger)
4. Mao (Hare/Rabbit)
5. Chen (Dragon)
6. Si (Snake)
7. Wu (Horse)
8. Wei (Sheep)
9. Shen (Monkey)
10. You (Rooster)
11. Xu (Dog)
12. Hai (Pig)

Year Names

1. Jia-Zi	16. Ji-Mao	31. Jia-Wu	46. Ji-You
2. Yi-Chou	17. Geng-Chen	32. Yi-Wei	47. Geng-Xu
3. Bing-Yin	18. Xin-Si	33. Bing-Shen	48. Xin-Hai
4. Ding-Mao	19. Ren-Wu	34. Ding-You	49. Ren-Zi
5. Wu-Chen	20. Gui-Wei	35. Wu-Xu	50. Gui-Chou
6. Ji-Si	21. Jia-Shen	36. Ji-Hai	51. Jia-Yin
7. Geng-Wu	22. Yi-You	37. Geng-Zi	52. Yi-Mao
8. Xin-Wei	23. Bing-Xu	38. Xin-Chou	53. Bing-Chen
9. Ren-Shen	24. Ding-Hai	39. Ren-Yin	54. Ding-Si
10. Gui-you	25. Wu-Zi	40. Gui-Mao	55. Wu-Wu
11. Jia-Xu	26. Ji-Chou	41. Jia-Chen	56. Ji-Wei
12. Yi-Hai	27. Geng-Yin	42. Yi-Si	57. Geng-Shen
13. Bing-Zi	28. Xin-Mao	43. Bing-Wu	58. Xin-You
14. Ding-Chou	29. Ren-Chen	44. Ding-Wei	59. Ren-Xu
15. Wu-Yin	30. Gui-Si	45. Wu-Shen	60. Gui-Hai

Sources

- *Explanatory Supplement to the Astronomical Almanac*, 1992. http://astro.nmsu.edu/~lhuber/leaphist.html

A table with the Chinese characters for all the terrestrial branches and celestial stems may be found in *Mathew's Chinese-English Dictionary* (Harvard University Press, 1972), page 1176.

Comparison of Calendars

Calendar	Gregorian	Jewish	Islamic	Hindu
Year	**2009**	**5770**	**1431**	**1932**
Month 1	January	Tishri (mid-September to mid - October)	Muharram (the sacred month) late spring	Chaitra (March-April)
Month 2	February	Heshvan (mid-October to mid-November)	Safar	Vaisakha (April-May)
Month 3	March	Kislev (mid-November to mid-December)	Rabi ul-Awwal	Jyaistha (May-June)
Month 4	April	Tevet (mid-December to mid-January)	Rabi ul-Thani	Asadha (June-July)
Month 5	May	Shevat (mid-January to mid-February)	Jumada-L-Oula	Sravana (July-August)
Month 6	June	Adar (mid-February to mid-March)	Jumada-L-Thani	Bhadra (August-Sept.)
Month 7	July	Nisan (mid-March to mid-April)	Rajab	Asvina (Sept.-Oct.)
Month 8	August	Iyar (mid-April to mid-May)	Shaban	Kartika (Oct.-Nov.)
Month 9	September	Sivan (mid-May to mid-June)	Ramadan	Agrahayana (Nov.-Dec.)
Month 10	October	Tammuz (mid-June to mid-July)	Shawwal	Pausa (Dec.-Jan.)
Month 11	November	Av (mid-July to mid-August)	Dhu-L-Qui-Da	Magha (Jan.-Feb.)
Month 12	December	Elul (mid-August to mid-September)	Dhu-L-Hijja (the month of pilgrimage)	Phalguna (Feb.-March)

Note: Tishri, Muharram, and Chaitra do not occur at the same time of the year. The only thing they have in common is that they are the first months of the year for the calendar of which they are a part. January occurs in the winter, Tishri in the fall, Muharram in the late spring, and Chaitra in the early spring. The names of the Islamic months are an ancient reflection of the seasons of the solar year.

Sources

- Explanatory Supplement to the Astronomical Almanac, 1992. http://astro.nmsu.edu/~lhuber/leaphist.html

- Thompson, Sue Ellen, and Barbara W. Carlson. *Holidays, Festivals, and Celebrations of the World Dictionary*. Detroit: Omnigraphics, Inc., 1994.

Symbols of World Religions

BAHA'I
The Baha'i faith is based on the worship of one god, who is at the root of all religions. The Baha'i symbol is a nine-pointed star that stands for this combination of faiths.

BUDDHISM
The Buddhist faith is based on the teachings of the Buddha. Its symbol is an eight-spoked Wheel of Life which depicts the eightfold path to Nirvana.

CHRISTIANITY
Christians believe that Jesus Christ is the Son of God. Their symbol is a cross, a symbol of the Crucifixion of Jesus Christ, which represents his love for humanity in dying for its sins.

HINDUISM
Hindus believe in many gods but in one underlying Reality. Their symbol is a sacred sound, OM, and is the seed of all mantras or prayers.

ISLAM
The Islamic faith is based on the belief in one god, Allah. Their symbol is a star and a crescent moon. The origins of the symbol are obscure, but most sources say that these are ancient celestials symbols used in worship.

JAINISM
The Jain religion adopted an open palm as its symbol in 1975, the 2,500th anniversary of the Jain spiritual leader Mahavira's enlightenment. The palm usually has the word *ahimsa* ("nonviolence") written on it.

JUDAISM
The Jewish symbol is the Magen David (Star of David) composed of two equilateral triangles overlaid to form a six-pointed star. Magen David is the Hebrew term for the Shield of David.

SIKHISM
The Sikh symbol is the Khanda, a special type of double-edged sword that represents the Sikhs' belief in one God. The right edge symbolizes freedom and authority governed by moral and spiritual values. The left edge symbolizes divine justice which chastises and punishes wicked oppressors. On the left side of the sword is spiritual sovereignty, Piri; on the right side is political sovereignty, Miri. The circle, called the Chakra, represents the infiniteness of the timeless absolute.

Sources

The Dorling Kindersley Visual Encyclopedia. New York: Dorling Kindersley, 1995.

http://www.sikh.net/sikhism/khanda.htm

Helpful Numbers

Please feel free to contact the following organizations for more information about any festival or ethnic celebration:

Dayton Community

American Czechoslovakian Club	(937) 222-9771
Boonshoft Museum of Discovery	(937) 275-7431
Carillon Historical Park	(937) 293-2841
Celtic Academy of Irish Dancing	(937) 256-6086
CityFolk Festival	(937) 223-3655
Cuba Cultural Group	(937) 434-3523
Culture Works	(937) 222-2787
Dayton Area Chinese Association	(937) 434-1834
Dayton Area Korean Association	(937) 429-4832
Dayton Art Institute	(937) 223-5277
Dayton Black Cultural Festival	(937) 224-7100
Dayton Cultural Center & Gift Gallery	(937) 223-2489
Dayton Holiday Festival, Inc.	(937) 224-1518
Dayton International Festival, Inc. (DIFI)	(937) 293-5173
Dayton Lesbian/Gay Center	(937) 274-1776
Dayton Music Festival	(937) 225-2333
Del Pueblo, Inc.	(937) 845-8670
German Club Edelweiss	(937) 836-6889
German Fest	(937) 293-3099
Greek Festival	(937) 224-0601
Hispanic Festival	(937) 236-6314
India Club of Greater Dayton	(937) 775-2127
Italian Festa	(937) 258-3600
Latin American Association	(937) 845-0865
Mexico Club of Greater Dayton	(937) 667-5145
Miami Valley African Organization	(937) 263-4516
Miami Valley Council for Native Americans	(937) 275-8599
Middfest International Celebration	(513) 425-7707
Mountain Days Festival (Appalachian)	(937) 781-0663
National Afro-American Museum	(937) 376-4944
Paul Laurence Dunbar House	(937) 224-7061
Philippine American Society of Greater Dayton	(937) 276-3579
Puerto Rican Cultural Society	(937) 222-1505
Riverbend Arts Center	(937) 333-7000
South Slavic Center	(937) 427-2543
SunWatch Indian Village	(937) 268-8199
United States Air Force Museum	(937) 255-3286
Vietnamese Association of Greater Dayton	(937) 236-1103

Religious Organizations in the Dayton Community

Baha'i Faith	(937) 294-6869
Dayton Sikh Society	(937) 427-1868
Greater Dayton Christian Connections	(937) 227-9485
Greek Orthodox Church	(937) 224-0601
Hindu Temple	(937) 429-4455
Hispanic Catholic Ministry	(937) 222-1340
Interdenominational Ministerial Alliance (IMA)	(937) 268-0051
Islamic Center of Dayton	(937) 228-1503
Jain Center of Cincinnati-Dayton	(513) 755-1400
Jewish Community Relations Council (JCRC)	(937) 854-4150
Office of the National Conference for Community and Justice	(937) 222-6225
Southern Christian Leadership Conference (SCLC)	(937) 268-0051