



Day of the Week Finder Worksheet 2026

Zeller steps, doomsday anchors and spreadsheet codes

DATE	WHAT HAPPENS	DONE
Step 1	Write the date as q (day), m (month) and year. Jan. and Feb. count as months 13 and 14 of the previous year.	☐
Step 2	K = last two digits of that year. J = first two digits.	☐
Step 3	$h = (q + \text{floor}(13(m+1)/5) + K + \text{floor}(K/4) + \text{floor}(J/4) + 5J) \bmod 7$	☐
Step 4	h: 0 Saturday, 1 Sunday, 2 Monday, 3 Tuesday, 4 Wednesday, 5 Thursday, 6 Friday	☐
Check 1	July 4, 1776: $4 + 20 + 76 + 19 + 4 + 85 = 208$, and $208 \bmod 7 = 5$, Thursday	☐
Check 2	Jan. 1, 2000 as 1/13/1999: $1 + 36 + 99 + 24 + 4 + 95 = 259$, $\bmod 7 = 0$, Saturday	☐
Doomsday dates	4/4, 6/6, 8/8, 10/10, 12/12, 5/9, 9/5, 7/11 and 11/7 share one weekday in a year	☐
Jan. and Feb.	Jan. 3 (Jan. 4 in a leap year) and the last day of February share it too	☐
Century anchor	1800s Friday, 1900s Wednesday, 2000s Tuesday, 2100s Sunday	☐
Year doomsday	Anchor + $\text{floor}(yy/12) + (yy \bmod 12) + \text{floor}((yy \bmod 12)/4)$, count forward $\bmod 7$	☐
2026	Doomsday is Saturday, so July 4, 2026 is a Saturday	☐
Spreadsheet	Weekday of DATE(y,m,d): 1 Sunday to 7 Saturday. Type 2: 1 Monday to 7 Sunday	☐
Julian dates	Before Oct. 15, 1582 (Sept. 14, 1752 in Britain) swap $\text{floor}(J/4) + 5J$ for $5 - J$	☐

My notes