**A Day For Any Date**

**The basic method for mental calculation to determine the day of the week of any date**

**Code of the day of the week** = (**D** + **M** + **Y** + **Y \ 4** + **C**) **Mod 7**

Where:

**D is the day of the month**

**M is the code of the month**

**Y is the last two digits of the year**

**\ is an integer division**

**C is the code of the century**

The current Gregorian system (Since Oct 15, 1582 AD):

* **Gregorian Factor** = (The year EXCEPT the last two digits) **Mod 4**
* Gregorian leap year is the year which is divisible by **4** EXCEPT that which is simultaneously divisible by **100** and NOT divisible by **400**

The previous Julian system (Since Jan 1, 1 AD):

* **Julian Factor** = (The year EXCEPT the last two digits) **Mod 7**
* Julian leap year is the year which is divisible by **4**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Month** | **M** | **Gregorian Factor** | **C** | **Julian Factor** | **C** | **Code of the day of the week** | **Day of the week** |
| **MAY** | **0** | **0** | **0** | **0** | **5** | **0** | **Sunday** |
| **FEB\*, AUG** | **1** | **1** | **5** | **1** | **4** | **1** | **Monday** |
| **FEB, MAR, NOV** | **2** | **2** | **3** | **2** | **3** | **2** | **Tuesday** |
| **JUN** | **3** | **3** | **1** | **3** | **2** | **3** | **Wednesday** |
| **SEP, DEC** | **4** |  | | **4** | **1** | **4** | **Thursday** |
| **JAN\*, APR, JUL** | **5** | **5** | **0** | **5** | **Friday** |
| **JAN, OCT** | **6** | **6** | **6** | **6** | **Saturday** |
| **\*Leap year** | |  | |  | |