





Dodatko Alexander November 2012





How many moths does the year consist of?



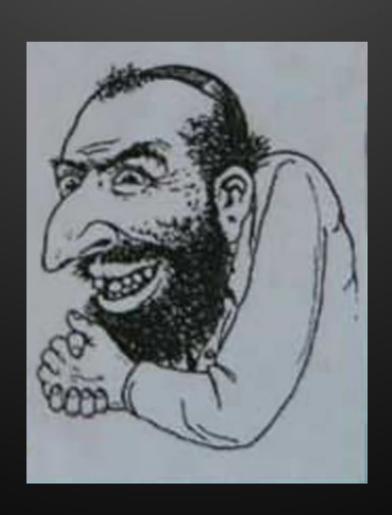
What is the first day of the year?



Which day is the beginning of the week?

Right, but did you know that ...

Jewish calendar consists of 13 months. And month #6 is a leaping one.



In Japan the calendar may return to year #1 at the day of the emperor's death



In Russia week starts on Monday.

In the USA the first day is Sunday



Dates must look in the way the user expects











The Typical Solution



```
-(NSDate*)parseDate:( NSString* )date_
 NSDateFormatter* df_ = [ NSDateFormatter new ];
 df_.dateFormat = @"yyyy-MM-dd";
 return [ df_ dateFromString: date_ ];
```



WRONG!

NSDateFormatter NSCalendar **NSLocale NSLocale**



Use en US POSIX locale for dates from the network

Use Gregorian calendar too



Do not forget to set the same Locale for both NSCalendar and NSDateFormatter

Or let my library do it for you



dodikk / ESLocale



Insert bar chart screenshot here



SELECT SUM(Visits)
FROM VisitsLog
WHERE Date BETWEEN
x AND y
GROUP BY week



What should I take as week?



SELECT SUM(Visits)
FROM VisitsLog
WHERE Date BETWEEN x AND y
GROUP BY

Strftime('%Y-%W', Date)



SELECT SUM(Visits)
FROM VisitsLog
WHERE Date BETWEEN x AND y
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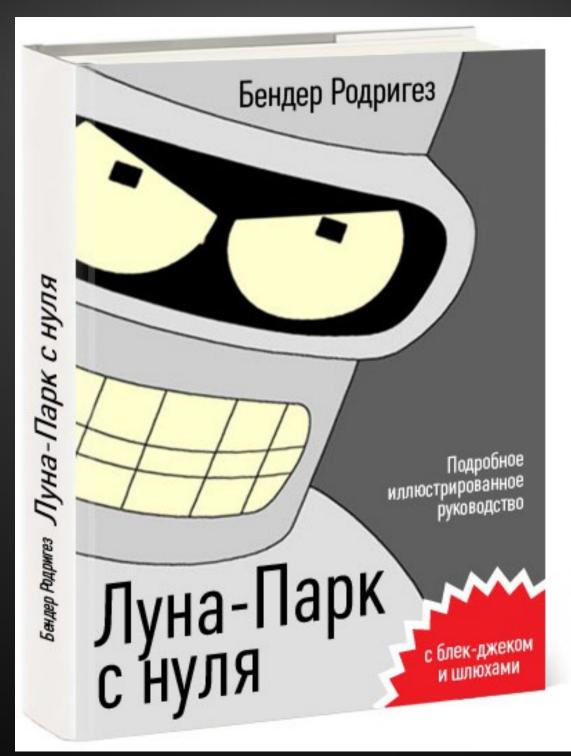






SELECT SUM(Visits)
FROM VisitsLog
WHERE Date BETWEEN x AND y
GROUP BY

```
ObjcFormatDate('YYYY-ww', Date, 'en_US_POSIX')
```



```
int sqlite3 create function(
   dbHandle,
   "ObjcFormatDate",
   3, //int nArg,
   SQLITE UTF8,
    NULL, // sqlite user data
void (*xFunc)
(sqlite3_context*,int,sqlite3_value**),
 NULL, NULL // for aggregates
```

Plan of attack

Convert C strings to NSString

Convert date string to NSDate

Format NSDate using locale

