datetime.c   `/* Displays the current date and time in three formats */`

```
#include <stdio.h>
#include <time.h>

int main(void)
{
  time_t current = time(NULL);
  struct tm *ptr;
  char date_time[21];
  int hour;
  char am_or_pm;

  /* Print date and time in default format */
  puts(ctime(&current));

  /* Print date and time, using strftime to format */
  strftime(date_time, sizeof(date_time),
           "%m-%d-%Y  %I:%M%p\n", localtime(&current));
  puts(date_time);

  /* Print date and time, using printf to format */
  ptr = localtime(&current);
  hour = ptr->tm_hour;
  if (hour <= 11)
    am_or_pm = 'a';
  else {
    hour -= 12;
    am_or_pm = 'p';
  }
  if (hour == 0)
    hour = 12;
  printf("%.2d-%.2d-%d  %2d:%.2d%c\n", ptr->tm_mon + 1,
         ptr->tm_mday, ptr->tm_year + 1900, hour,
         ptr->tm_min, am_or_pm);

  return 0;
}
```

The output of `datetime.c` will have the following appearance:

```
Sun Jun  3 17:48:34 2007

06-03-2007  05:48PM

06-03-2007   5:48p
```

Q & A

Q: Although `<stdlib.h>` provides a number of functions that convert strings to numbers, there don't appear to be any functions that convert numbers to strings. What gives?