

# Dates and Times in SQL Server

<http://BrentOzar.com/Community>

Type	Note	Range	Size	Fractional Precision?	Accuracy
DATETIME	Not recommended for new development	1753-01-01 to 9999-12-31	8 bytes	No	Rounded to .000, .003, or .007 seconds
SMALLDATETIME		1900-01-01 to 2079-06-06	4 bytes	No	One minute
DATE	SQL 2008 + Smaller than an int	0001-01-01 to 9999-12-31	3 bytes	No	One day
TIME	SQL 2008 +	00:00:00.0000000 to 23:59:59.9999999	3-5 bytes	Yes	100 nanosecs (configurable)
DATETIME2	SQL 2008 +	0001-01-01 00:00:00 to 9999-12-31 23:59:59.9999999	6-8 bytes	Yes	100 nanosecs (configurable)
DATETIMEOFFSET	SQL 2008 +	Same as DATETIME2 (in UTC)	8-10 bytes	Yes	100 nanosecs (configurable)

## Selected Functions

GetDate()  
 Cast(expression as data.type(length))  
 Convert(data.type(length), expression, style)  
 DatePart(datepart, date)  
 DateDiff(datepart, startdate, enddate)  
 DateAdd(datepart, number, date)  
 IsDate(expression)

## SQL Server 2008 +

SysDatetime()

## SQL Server 2012

Try.Convert(data.type(length), expression, style)  
 Try.Parse(string AS datatype USING culture)\*

**\*Uses the CLR**



**BRENT OZAR**  
UNLIMITED