

## SQL Server Data Types

## Exact Numerics

|          |         |
|----------|---------|
| bit      | decimal |
| tinyint  | money   |
| smallint | numeric |

bigint

## Approximate Numerics

|       |      |
|-------|------|
| float | real |
|-------|------|

## Date and Time

|               |           |
|---------------|-----------|
| smalldatetime | timestamp |
|---------------|-----------|

datetime

## Strings

|      |      |
|------|------|
| char | text |
|------|------|

varchar

## Unicode Strings

|       |       |
|-------|-------|
| nchar | ntext |
|-------|-------|

nvarchar

## Binary Strings

|        |       |
|--------|-------|
| binary | image |
|--------|-------|

varbinary

## Miscellaneous

|        |       |
|--------|-------|
| cursor | table |
|--------|-------|

|             |     |
|-------------|-----|
| sql_variant | xml |
|-------------|-----|

## SQL Server Type Conversion

CAST (expression AS datatype)

CONVERT (datatype, expression)

## SQL Server Table Functions

|       |      |
|-------|------|
| ALTER | DROP |
|-------|------|

|        |          |
|--------|----------|
| CREATE | TRUNCATE |
|--------|----------|

## SQL Server Grouping (Aggregate)

## Functions

|                 |        |
|-----------------|--------|
| AVG             | MAX    |
| BINARY_CHECKSUM | MIN    |
| CHECKSUM        | SUM    |
| CHECKSUM_AVG    | STDEV  |
| COUNT           | STDEVP |
| COUNT_BIG       | VAR    |
| GROUPING        | VARP   |

## SQL Server Ranking Functions

|            |            |
|------------|------------|
| RANK       | NTILE      |
| DENSE_RANK | ROW_NUMBER |

## SQL Server String Functions

|            |           |
|------------|-----------|
| ASCII      | REPLICATE |
| CHAR       | REVERSE   |
| CHARINDEX  | RIGHT     |
| DIFFERENCE | RTRIM     |
| LEFT       | SOUNDEX   |
| LEN        | SPACE     |
| LOWER      | STR       |
| LTRIM      | STUFF     |
| NCHAR      | SUBSTRING |
| PATINDEX   | UNICODE   |
| REPLACE    | UPPER     |
| QUOTENAME  |           |

## SQL Server Date Functions

DATEADD (datepart, number, date)

DATEDIFF (datepart, start, end)

DATENAME (datepart, date)

DATEPART (datepart, date)

DAY (date)

GETDATE()

GETUTCDATE()

MONTH (date)

YEAR (date)

## SQL Server Dateparts

|          |             |
|----------|-------------|
| yy, yyyy | Year        |
| qq, q    | Quarter     |
| mm, m    | Month       |
| dy, y    | Day of Year |
| dd, d    | Day         |
| wk, ww   | Week        |
| hh       | Hour        |
| mi, n    | Minute      |
| ss, s    | Second      |
| ms       | Millisecond |

## SQL Server Mathematical Functions

|         |         |
|---------|---------|
| ABS     | LOG10   |
| ACOS    | PI      |
| ASIN    | POWER   |
| ATAN    | RADIANS |
| ATN2    | RAND    |
| CEILING | ROUND   |
| COS     | SIGN    |
| COT     | SIN     |
| DEGREES | SQUARE  |
| EXP     | SQRT    |
| FLOOR   | TAN     |
| LOG     |         |