

CHAR Function

Generates the Unicode character corresponding to an inputted Integer value.

Unicode is a digital standard for the consistent encoding of the world's writing systems, so that representation of character sets is consistent around the world.

- The first 256 Unicode characters (0, 255) correspond to the ASCII character set.
- Input values for the CHAR function should be of integer type. Decimal type column data can be used as input. However, if the data contains digits to the right of the decimal point, the CHAR function returns a missing value.
- If the function cannot evaluate the numeric data, a null value is returned.

Basic Usage

Column reference example:

```
char(MyCharIndex)
```

Output: Returns the Unicode value for the number in the MyCharIndex column.

String literal example:

```
char(65)
```

Output: Returns the string: A.

Syntax and Arguments

```
char(index_value)
```

Argument	Required?	Data Type	Description
index_value	Y	integer (positive)	Unicode index value of the character

For more information on syntax standards, see *Language Documentation Syntax Notes*.

index_value

Unicode index value of the character to generate or match.

- The Unicode character set contains up 1,114,112 characters. Most uses rely on the first 10,000 characters.
- Value must be less than end_index.

Usage Notes:

Required?	Data Type	Example Value
Yes	Integer (non-negative)	65

Examples

Tip: For additional examples, see *Common Tasks*.

Example - char and unicode functions

In this example, you can see how the `CHAR` function can be used to convert numeric index values to Unicode characters, and the `UNICODE` function can be used to convert characters back to numeric values.

Source:

The following column contains some source index values:

index
1
33
33.5
34
48
57
65
90
97
121
254
255
256
257
9998
9999

Transformation:

When the above values are imported to the Transformer page, the column is typed as integer, with a single mismatched value (33.5). To see the corresponding Unicode characters for these characters, enter the following transformation:

Transformation Name	New formula
Parameter: Formula type	Single row formula
Parameter: Formula	<code>CHAR(index)</code>
Parameter: New column name	'char_index'

To see how these characters map back to the index values, now add the following transformation:

Transformation Name	New formula
Parameter: Formula type	Single row formula
Parameter: Formula	UNICODE(char_index)
Parameter: New column name	'unicode_char_index'

Results:

index	char_index	unicode_char_index
1		1
33	!	33
33.5		
34	"	34
48	0	48
57	9	57
65	A	65
90	Z	90
97	a	97
122	z	122
254	þ	254
255	ÿ	255
256		256
257		257
9998		9998
9999		9999

Note that the floating point input value was not processed.