

Trigonometric Functions

AtScale supports the following MDX trigonometric functions in a calculated measure formula.

Function Signature	Description
acos(numeric_expression)	Returns the angle, in radians, whose cosine is the specified float expression.
asin(numeric_expression)	Returns the angle, measured in radians, whose sine is the specified float expression.
atn(numeric_expression)	Returns the measurement of the angle, in radians, whose tangent is the specified float expression.
cos(numeric_expression)	Returns the cosine of the specified angle, which is in radians, as a float expression.
exp(x)	Returns ex where e is the base of the natural logarithm.
sin(numeric_expression)	Returns the sine of the specified angle, which is in radians, as a float expression.
tan(numeric_expression)	Returns the tangent of the specified angle, which is in radians, as a float expression.

Example:

```
3959 * ACOS(COS((PI()/180) * [Y])
* COS((PI()/180) * [X])
* COS((PI()/180) * [CentralLat])
* COS((PI()/180) * [CentralLong])
+ COS((PI()/180) * [Y])
* SIN((PI()/180) * [X])
* COS((PI()/180) * [CentralLat])
* SIN((PI()/180) * [CentralLong])
+ SIN((PI()/180) * [Y])
* SIN((PI()/180) * [CentralLat]) )
```