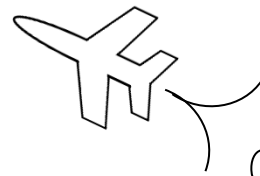


# MAth on the Fly!



NAME: \_\_\_\_\_ DATE: \_\_\_\_\_

## Trigonometric Identities

Use trigonometric identities to simplify each expression.

1.  $\sec x \csc x \cos x$

2.  $\csc x \sin^2 x \cot x$

3.  $\frac{\tan x}{\sec x}$

4.  $\frac{\cos x \sin x}{\tan x}$

5.  $\cos(90^\circ - x) \csc x$

6.  $1 - \sin^2 x - \cos^2 x$

7.  $2\sin^2 x + \cos^2 x - \sin^2 x$

8.  $\sin(90^\circ - x) \tan x$

9.  $\frac{\sin x}{\csc x} + \frac{\cos x}{\sec x}$

10.  $\frac{\sqrt{1 - \cos^2 x}}{\sqrt{1 - \sin^2 x}}$

## SOLUTIONS

1.  $\frac{1}{\sin x}$  or  $\csc x$

2.  $\cos x$

3.  $\sin x$

4.  $\cos^2 x$

5. 1

6. 0

7. 1

8.  $\sin x$

9. 1

10.  $\frac{\sin x}{\cos x}$  or  $\tan x$