Practice worksheet | Integration techniques and applications

Trigonometric identities in integration

Name: _____ Date: _____

6 questions | 12 marks

1. Find $\int \cos^2(2x)\,dx$. [2 marks]

2. Find $\int \sin x \cos x\,dx$. [2 marks]

3. Find $\int \sin^2 x \cos^2 x\,dx$. [2 marks]

4. Evaluate $\int_0^{\frac{\pi}{2}} \sin^2 x \, dx$. [2 marks]

5. Find $\int \sin x \cos(3x) \, dx$. [2 marks]

6. Find $\int \cos^3 x \, dx$. [2 marks]