Graphical Interpretation of Convolution I

The convolution integral is

$$g(t) * u(t) = \int_{-\infty}^{\infty} g(t - \tau) u(\tau) \, d\tau$$

Plot $g(t - \tau)$ as a function of τ , for g(t) and t as shown.



Graphical Interpretation of Convolution I

Plot $g(t - \tau)$ as a function of τ , for g(t) and t as shown.



My confidence that I have the correct answer is:

- 1. 100%
- 2. 80%
- 3. 60%
- 4. 40%
- 5. 20%
- 6. 0%

Graphical Interpretation of Convolution I

The plot of $g(t-\tau)$ is given by



My answer

- 1. Was completely correct
- 2. Was mostly correct, with one or two minor errors
- 3. Had many errors
- 4. Was completely incorrect

Graphical Interpretation of Convolution II

The signals g(t) and u(t) are as plotted below. Plot $g(t-\tau)u(\tau)$ as a function of τ .



Graphical Interpretation of Convolution II

Plot $g(t - \tau)u(\tau)$ as a function of τ , for g(t) and u(t) as shown.



My confidence that I have the correct answer is:

- 1. 100%
- 2. 80%
- 3. 60%
- 4. 40%
- 5. 20%
- 6. 0%

Graphical Interpretation of Convolution II

The plot of $g(t-\tau)$ is given by



My answer

- 1. Was completely correct
- 2. Was mostly correct, with one or two minor errors
- 3. Had many errors
- 4. Was completely incorrect