Concept Question 1-2: What is the definition of a *causal* signal? *Noncausal* signal? *Anticausal* signal?

A continuous-time causal signal $x(t)$ is zero for $t < 0$. A discrete-time causal signal $x[n]$ is zero for $n < 0$. At time zero, $x(0)$ may or may not be 0, but it may also be undefined; the step function $u(t)$ is undefined at $t = 0$, while $x[0]$ is (usually) nonzero.

A signal $x(t)$ (or $x[n]$) is noncausal if $x(t) \neq 0$ (or $x[n] \neq 0$) for $t < 0$ (or $n < 0$).

A continuous-time anticausal signal $x(t)$ is zero for $t > 0$. A discrete-time anticausal signal $x[n]$ is zero for $n > 0$, and $x[0] = 0$.