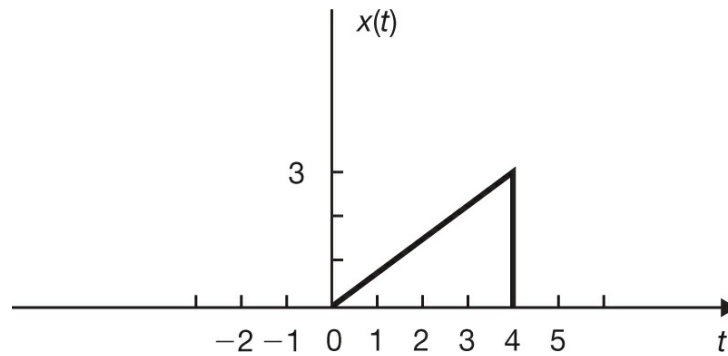


Tutorial and Solution 2z-03

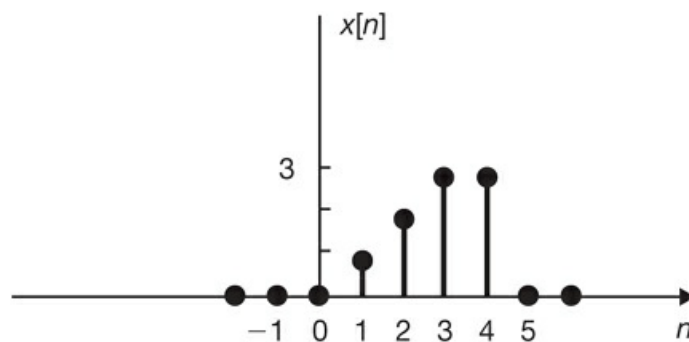
Q1. A continuous-time signal $x(t)$ is shown below. Sketch and label each of the following signals.

- (a) $x(t - 2)$;
- (b) $x(2t)$;
- (c) $x(t/2)$;
- (d) $x(-t)$



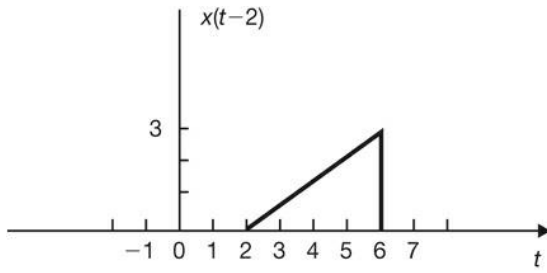
Q2. A discrete-time signal $x[n]$ is shown in Fig. 1-19. Sketch and label each of the following signals.

- (a) $x[n - 2]$;
- (b) $x[2n]$;
- (c) $x[-n]$;
- (d) $x[-n + 2]$

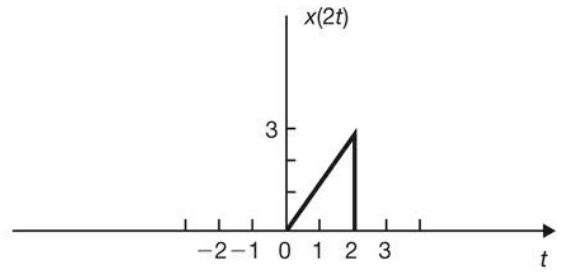


SOLUTION

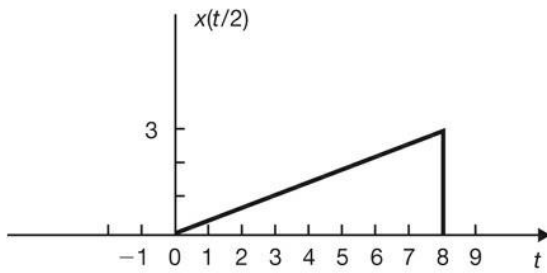
Q1



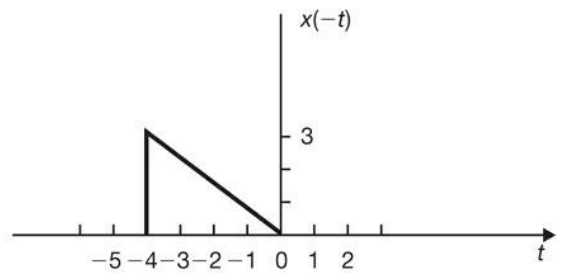
(a)



(b)

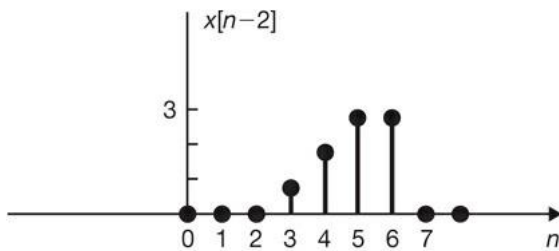


(c)

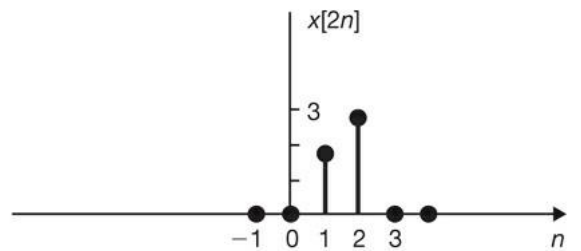


(d)

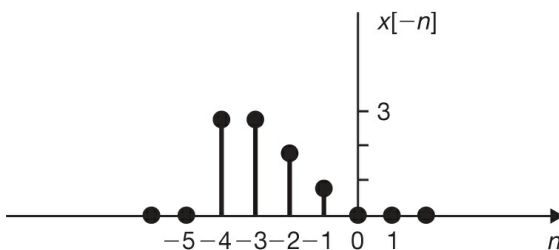
Q2



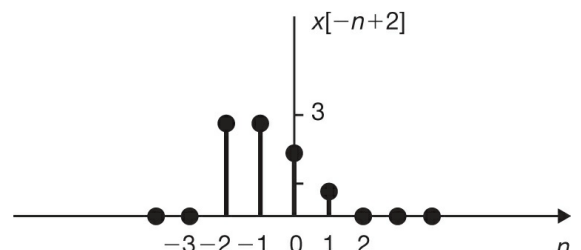
(a)



(b)



(c)



(d)