```
T = 2;

f10[x_] := Which[-1 ≤ x < (-1/2), (-x - 1), (-1/2) ≤ x < 1/2, x,

  1/2 ≤ x ≤ 1, (-x + 1), (-1 - T) ≤ x < (-1/2 - T), (-x - 1 - T), (-1/2 - T) ≤ x < (1/2 - T),

  (x + T), (1/2 - T) ≤ x ≤ (1 - T), (-x + 1 - T), (-1 + T) ≤ x < (-1/2 + T), (-x - 1 + T),

  (-1/2 + T) ≤ x < (1/2 + T), (x - T), (1/2 + T) ≤ x ≤ (1 + T), (-x + 1 + T)]


f20[x_] := Which[-1 ≤ x < 1, 2 * x, -1 - T ≤ x < 1 - T, 2 * (x + T), -1 + T ≤ x < 1 + T, 2 * (x - T)]



p1 = Plot[f10[x], {x, -2 T, 2 T}, PlotRange → {{-T, T}, {-1, 1}},
  PlotStyle → {Thickness[0.01], RGBColor[0, 1, 0]},
  AxesLabel → {"x", "f(x)"}, PlotLabel → "f(x)對x做圖"]
p2 = Plot[f20[x], {x, -2 T, 2 T}, PlotRange → {{-T, T}, {-3, 3}},
  PlotStyle → {Thickness[0.01], RGBColor[0, 1, 0]},
  AxesLabel → {"x", "g(x)"}, PlotLabel → "g(x)對x做圖"]

f11[x_] := f10[x + 1]
f21[x_] := f20[x - 1]

p3 = Plot[f11[x], {x, -2 T, 2 T}, PlotRange → {{-T, T}, {-1, 1}},
  PlotStyle → {Thickness[0.01], RGBColor[0, 0, 1]},
  AxesLabel → {"x", "f(x+1)"}, PlotLabel → "f(x+1)對x做圖"]
p4 = Plot[f21[x], {x, -2 T, 2 T}, PlotRange → {{-T, T}, {-3, 3}},
  PlotStyle → {Thickness[0.01], RGBColor[0, 0, 1]},
  AxesLabel → {"x", "g(x-1)"}, PlotLabel → "g(x-1)對x做圖"]

g1[x_] := f10[x] + f20[x]

p5 = Plot[g1[x], {x, -2 T, 2 T}, PlotRange → {{-T, T}, {-3, 3}},
  PlotStyle → {Thickness[0.01], RGBColor[1, 0, 0]},
  AxesLabel → {"x", "f(x)+g(x)"}, PlotLabel → "f(x)+g(x)對x做圖"]

g2[x_] := f10[x] * f21[x]

p6 = Plot[g2[x], {x, -2 T, 2 T}, PlotRange → {{-T, T}, {-1, 1}},
  PlotStyle → {Thickness[0.01], RGBColor[1, 0, 0]},
  AxesLabel → {"x", "f(x)*g(x-1)"}, PlotLabel → "f(x)·g(x-1)對x做圖"]

g3[x_] := f11[x] * f20[x]

p7 = Plot[g3[x], {x, -2 T, 2 T}, PlotRange → {{-T, T}, {-1, 1}},
  PlotStyle → {Thickness[0.01], RGBColor[1, 0, 0]},
  AxesLabel → {"x", "f(x+1)*g(x)"}, PlotLabel → "f(x+1)·g(x)對x做圖"]
```
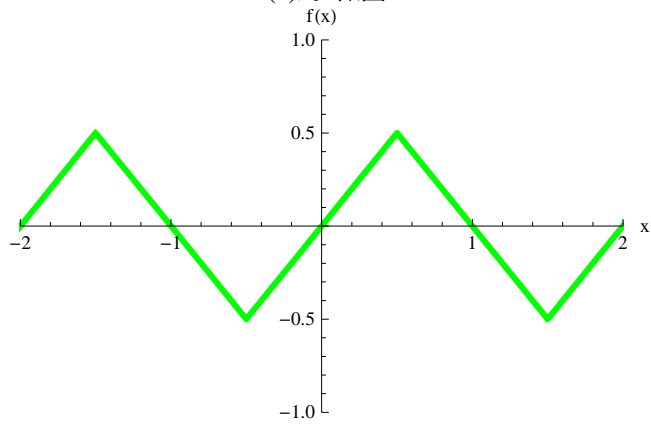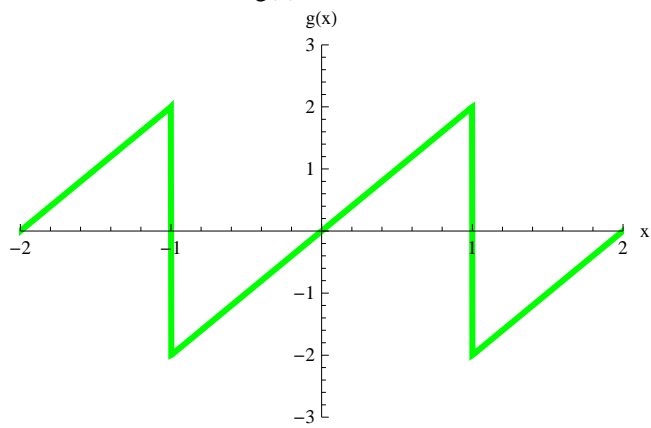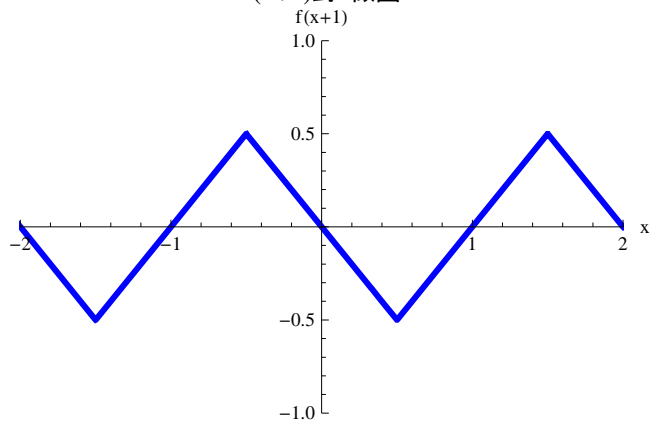
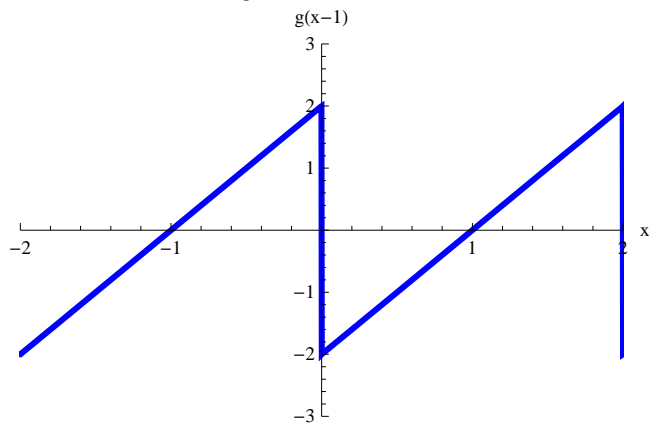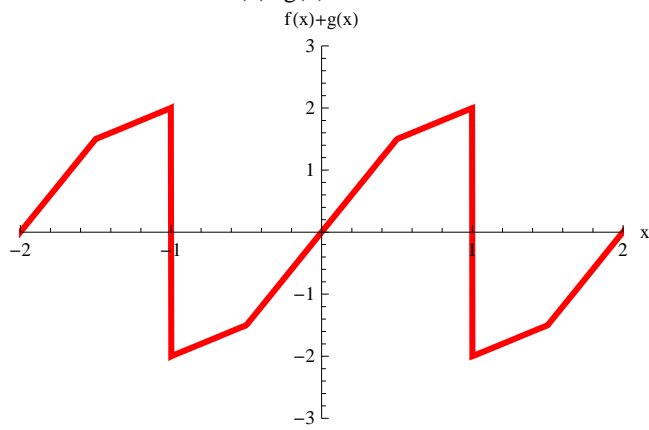### f(x)對x做圖

f(x)

g(x)對x做圖

g(x)

f(x+1)對x做圖

f(x+1)

g(x−1)對x做圖

g(x−1)

f(x)+g(x)對x做圖

f(x)+g(x)

f(x)·g(x−1)對x做圖

f(x)*g(x−1)

f(x+1)·g(x)對x做圖