

$$\sigma_f(1, F)$$

$$r_n + r = 1 \Rightarrow r = -\frac{1}{F} \Rightarrow \alpha \beta = \boxed{\frac{V}{r}}$$

$$1 - r(F) = -V$$

(2)

(V)

$$D_f = (a, r]$$

$$y = f(x-1) + g(x+1) \rightarrow b-1=a \Rightarrow \boxed{b=r} \quad a+1=-r \Rightarrow \boxed{a=-r}$$

$$b-1=a \Rightarrow \boxed{b=r}$$

$$a+1=-r \Rightarrow \boxed{a=-r}$$

$$a-b = -r-r = \boxed{-2r}$$

$$D_g = [-1, b)$$

$$-1 \leq x+1 < b \rightarrow -r \leq x < b-1$$

$$y_1 = f\left(\frac{x}{r} + 1\right)$$

$$D_f = [-r, a]$$

$$\left. \begin{aligned} -\frac{r}{r} + 1 &= -\frac{1}{r} \\ \frac{a}{r} + 1 &= \frac{V}{r} \end{aligned} \right\} \rightarrow D = \left[-\frac{1}{r}, \frac{V}{r} \right]$$

$$D = \left[-\frac{1}{r}, \frac{V}{r} \right]$$

$$R_f = [-1, r] \xrightarrow{x^r} [-r, r] \xrightarrow{-r} [-a, 1] \xrightarrow{1} [0, a] \xrightarrow{\sqrt{\cdot}} \boxed{[0, \sqrt{a}]}$$

$$f(x) = \left| \frac{x+1}{r_n+1} \right| \Rightarrow g(x) = \left| \frac{x-r+1}{r(x-r)+1} \right| + 1 = \left| \frac{x-1}{r_n-r} \right| + 1$$

$$\left| \frac{x-1}{r_n-r} \right| + 1 + x < 0 \Rightarrow \left| \frac{x-1}{r_n-r} \right| < -x-1$$

$$\frac{1}{+|-|+}$$

$$-x-1 > 0 \Rightarrow x < -1 \Rightarrow \frac{x-1}{r_n-r} > 0$$

$$\frac{x-1}{r_n-r} + x + 1 < 0 \Rightarrow \frac{x-1 + x(r_n-r) - x(r_n-r) + x(r_n-r)}{r_n-r} \Rightarrow \frac{r_n^2 - r}{r_n-r} < 0$$

$$\frac{r_n^2 - r}{r_n-r} < 0$$

$$\frac{r_n^2 - r}{r_n-r} < 0 \quad x < -1, r_n-r < 0$$

$$\frac{-\sqrt{r} \sqrt{r}}{+|-|+}$$

$$\sqrt{(-\infty, -\sqrt{r}) \cup (\sqrt{r}, +\infty)}$$

$$\cap \rightarrow \boxed{(-\infty, -\sqrt{r})}$$