

A (دو طرفه حد)

تلف سوار ۲۰

سرعت ثابتی ۲۰

$$\frac{f(x) - f(1)}{x-1} = \frac{1 - \frac{a}{x} - 1 + a}{x} = \frac{\frac{a}{x}}{x} = \frac{a}{x^2} = \frac{a}{m^2}$$

$$f'(m) = \frac{a}{m^2}$$

(۱) $y = \sqrt{a}x^r - a$ $g(x) = a \Rightarrow \sqrt{a}x^r - a + 1 \wedge a = a \Rightarrow \sqrt{a}x^r - a + 1 \wedge a = 0$

(۲) $\Delta = 0$ $\Rightarrow \sqrt{a}x^r - a + 1 \wedge a = 0 \Rightarrow a = \pm \frac{1}{r}$

$a = \frac{1}{r} \Rightarrow y = x^r - a + 1 \wedge a = 0 \Rightarrow y = x^r - a + 1 \wedge a = 0$

(۳) $y = x^r - 1 \wedge a + r \rightarrow y' = r x^{r-1} - 1 \wedge r x^{r-1} - 1 = 0 \rightarrow x = \pm \sqrt[r]{r}$

در $x = \sqrt[r]{r}$ $y = r - 1 \wedge a = r - 1 \wedge a = r - 1 \wedge a = r - 1 \wedge a = r - 1$

(۴) $y = a x^r + a x^r - r b a - r^2 \rightarrow y' = r a x^{r-1} + r a x^{r-1} - r^2$

$y'(0) = 0 \rightarrow b = 0 \Rightarrow y = a x^r + r a x^{r-1} - r^2$

$y'(-r) = 0 \rightarrow 1 \wedge r - r^2 a = 0 \rightarrow a = \frac{r}{r^2} = \frac{1}{r}$

Ext نقاط \Rightarrow $\frac{1}{-r} \quad \frac{1}{-r}$

$\sqrt{r^2 + 1} = \sqrt{r^2} = r$

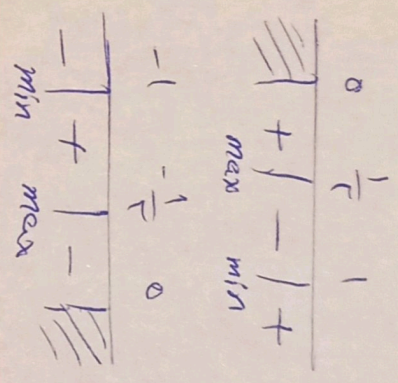
$f(m) = a x^r - a |m| = |m|^r - a |m|$

$$f(n) = \sqrt{a|n| - a}$$

$$a > 0 \rightarrow \sqrt{a^r - a}$$

$$a < 0 \rightarrow \sqrt{-a^r - a}$$

$$f'(n) = \begin{cases} \frac{ra-1}{r\sqrt{a^r-a}} & a > 0 \\ \frac{-ra-1}{r\sqrt{-a^r-a}} & a < 0 \end{cases}$$



$$\frac{km+n}{k-n} = \frac{1r}{r} = r$$

$n = r = \min$
 $m = r = \max$
 کرائیے $k = r$

(A)

$$y = \frac{m^r + r}{n-1+m}$$

$$y' = \frac{m(n-1+m) - m^r - r}{(n-1+m)^2} = \frac{m^r - m - r}{(n-1+m)^2} < 0$$

(9)

$$m^r - m - r < 0$$

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

$$m = -1, 0, 1$$

(+ always give)

$$f(n) = \frac{n}{1-m|n|}$$

$$\begin{matrix} a < 0 & \rightarrow & \frac{n}{1-a^r} \\ a > 0 & \rightarrow & \frac{n}{1+a^r} \end{matrix}$$

$$\lim_{n \rightarrow \infty} \frac{f(n) - f(n)}{m-a} = 1$$

تابع $a=1$ سے ملے گا
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(10)