

1.50
3

$$\frac{1}{81} \leq \left(\frac{1}{3}\right)^{\log_2(4^{|x|} - 5 \cdot 2^{|x|} + 10)} < \frac{1}{9}$$

$$\left(\frac{1}{3}\right)^4 \leq \left(\frac{1}{3}\right)^{\log_2(4^{|x|} - 5 \cdot 2^{|x|} + 10)} < \left(\frac{1}{3}\right)^2$$

$$4 \geq \log_2(4^{|x|} - 5 \cdot 2^{|x|} + 10) > 2$$

$$16 \geq 4^{|x|} - 5 \cdot 2^{|x|} + 10 > 4$$

$$2^{|x|} = t$$

$$0 \geq t^2 - 5t - 6 \quad \text{AND} \quad t^2 - 5t + 6 > 0$$

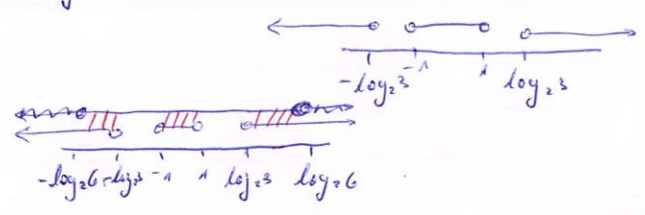


$$\begin{aligned} -1 \leq t \leq 6 \\ -1 \leq 2^{|x|} \leq 6 \\ 2^{|x|} \leq 6 \\ |x| \log_2 2 \leq \log_2 6 \\ -\log_2 6 \leq x \leq \log_2 6 \end{aligned}$$



$$\begin{aligned} t < 2 \quad \text{or} \quad t > 3 \\ 2^{|x|} < 2 \quad \text{or} \quad 2^{|x|} > 3 \\ |x| < 1 \quad \text{or} \quad |x| > \log_2 3 \\ -1 < x < 1 \quad \text{or} \quad x > \log_2 3 \quad \text{or} \quad x < -\log_2 3 \end{aligned}$$

1-5 0 1 2 0 6 2
מיון האי שוויון
למקרים
אם הבעיה
 $4^{|x|} - 5 \cdot 2^{|x|} + 10 > 0$
 $2^{|x|} = t$
 $t^2 - 5t + 10 > 0$
x B



$$\begin{aligned} -1 < x < 1 \\ \log_2 3 < x < \log_2 6 \\ -\log_2 6 < x < -\log_2 3 \end{aligned}$$

אם יש